



# STIC Search Report

EIC 1700

STIC Database Tracking Number: 10/849186

**TO:** John Chu  
**Location:** REM 9D51  
**Art Unit :** 1752  
**February 28, 2006**

**Case Serial Number:** 10/849186

**From:** Usha Shrestha  
**Location:** EIC 1700  
**REMSEN 4B28**  
**Phone:** 571/272-3519  
**usha.shrestha@uspto.gov**

Search Notes



# STIC Search Results Feedback Form

EIC17000

Questions about the scope or the results of the search? Contact *the EIC searcher or contact:*

Kathleen Fuller, EIC 1700 Team Leader  
571/272-2505 REMSEN 4B28

**Voluntary Results Feedback Form**

➤ I am an examiner in Workgroup:  Example: 1713  
➤ Relevant prior art **found**, search results used as follows:

- 102 rejection
- 103 rejection
- Cited as being of interest.
- Helped examiner better understand the invention.
- Helped examiner better understand the state of the art in their technology.

*Types of relevant prior art found:*

- Foreign Patent(s)
- Non-Patent Literature  
(journal articles, conference proceedings, new product announcements etc.)

➤ Relevant prior art **not found**:

- Results verified the lack of relevant prior art (helped determine patentability).
- Results were not useful in determining patentability or understanding the invention.

Comments:

=> fil reg  
FILE 'REGISTRY' ENTERED AT 09:54:43 ON 28 FEB 2006

=> d his

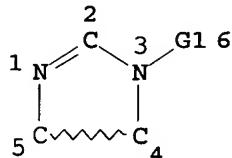
FILE 'REGISTRY' ENTERED AT 09:42:17 ON 28 FEB 2006  
ACT CHU186A/A

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L1      STR
L2      442695 SEA FILE=REGISTRY SSS FUL L1
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ACT CHU186/A
-----
L3      STR
L4      STR
L5  (  442695)SEA FILE=REGISTRY SSS FUL L3
L6      2290 SEA FILE=REGISTRY SUB=L5 SSS FUL L4
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ACT CHU197/A
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L7      STR
L8      STR
L9  (  442695)SEA FILE=REGISTRY SSS FUL L7
L10     8549 SEA FILE=REGISTRY SUB=L9 SSS FUL L8
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FILE 'HCAPLUS' ENTERED AT 09:46:55 ON 28 FEB 2006

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L11     1 S US20040234884/PN
L12     1 S US20050008968/PN
L13     924 S L6
L14     1426 S L10
L15     35 S L13 AND ?RESIST?
L16     52 S L14 AND ?RESIST?
      SEL L16 HIT RN 1-52
L17     21 S L16 AND PHOTOG?/SC,SX
L18     10 S L15 AND PHOTOG?/SC,SX
L19     25 S L15 NOT L18
L20     23 S L13 AND PHOTOG?/SC,SX
L21     23 S L18 OR L20
L22     1 S L21 AND L11
L23     48 S L14 AND PHOTOG?/SC,SX
L24     48 S L17 OR L23
L25     1 S L24 AND L12
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=> d que l21  
L3 STR

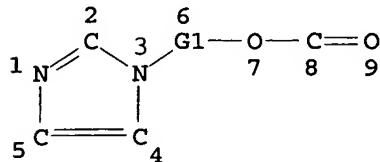


VAR G1=AK/CB  
NODE ATTRIBUTES:  
DEFAULT MLEVEL IS ATOM  
DEFAULT ECLEVEL IS LIMITED

## GRAPH ATTRIBUTES:

RING(S) ARE ISOLATED OR EMBEDDED  
NUMBER OF NODES IS 6

STEREO ATTRIBUTES: NONE  
L4 STR



VAR G1=AK/CB

## NODE ATTRIBUTES:

DEFAULT MLEVEL IS ATOM  
DEFAULT ECLEVEL IS LIMITED

## GRAPH ATTRIBUTES:

RING(S) ARE ISOLATED OR EMBEDDED  
NUMBER OF NODES IS 9

STEREO ATTRIBUTES: NONE

L5 ( 442695) SEA FILE=REGISTRY SSS FUL L3  
L6 2290 SEA FILE=REGISTRY SUB=L5 SSS FUL L4  
L13 924 SEA FILE=HCAPLUS ABB=ON PLU=ON L6  
L15 35 SEA FILE=HCAPLUS ABB=ON PLU=ON L13 AND ?RESIST?  
L18 10 SEA FILE=HCAPLUS ABB=ON PLU=ON L15 AND PHOTOG?/SC,SX  
  
L20 23 SEA FILE=HCAPLUS ABB=ON PLU=ON L13 AND PHOTOG?/SC,SX  
  
L21 23 SEA FILE=HCAPLUS ABB=ON PLU=ON L18 OR L20

=> fil hcap  
FILE 'HCAPLUS' ENTERED AT 09:54:57 ON 28 FEB 2006

=&gt; d l21 1-23 ibib abs hitstr hitind

L21 ANSWER 1 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN  
ACCESSION NUMBER: 2005:1155389 HCAPLUS  
DOCUMENT NUMBER: 143:413518  
TITLE: Nitrogen-containing organic compound,  
chemically amplified resist  
composition and patterning process  
INVENTOR(S): Watanabe, Takeru; Hasegawa, Koji; Takemura,  
Katsuya; Noda, Kazumi  
PATENT ASSIGNEE(S): Shin-Etsu Chemical Co., Ltd., Japan  
SOURCE: U.S. Pat. Appl. Publ., 23 pp.  
CODEN: USXXCO  
DOCUMENT TYPE: Patent  
LANGUAGE: English  
FAMILY ACC. NUM. COUNT: 1  
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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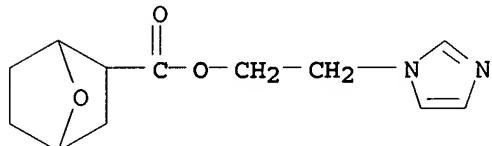
US 2005238993	A1	20051027	US 2005-110927	
				2005 0421
JP 2005306812	A2	20051104	JP 2004-128478	
				2004 0423
PRIORITY APPLN. INFO.:			JP 2004-128478	A
				2004 0423

AB Chemical amplified photoresist compns. comprising nitrogen-containing organic compds. having a 7-oxanorbornane-2-carboxylic ester structure have an excellent resolution and provide a precise pattern profile and are useful in microfabrication using electron beams or deep-UV light.

IT 867257-55-4P  
(nitrogen-containing organic compound for chemical amplified resist composition)

RN 867257-55-4 HCAPLUS

CN 7-Oxabicyclo[2.2.1]heptane-2-carboxylic acid, 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



IC ICM G03C001-492

INCL 430270100

CC 74-5 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)

ST nitrogen org compd chem amplified photoresist compn patterning process

IT Photolithography  
**Photoresists**  
(nitrogen-containing organic compound for chemical amplified resist composition and patterning process)

IT 867257-46-3P 867257-47-4P 867257-49-6P 867257-51-0P  
867257-52-1P 867257-54-3P  
(nitrogen-containing organic compound for chemical amplified resist composition)

IT 111-95-5P 867257-45-2P 867257-48-5P 867257-50-9P  
867257-53-2P 867257-55-4P 867257-56-5P 867257-57-6P  
867257-59-8P  
(nitrogen-containing organic compound for chemical amplified resist composition)

IT 102-71-6, Triethanolamine, reactions 102-79-4, Butyldiethanolamine 105-59-9, Methyldiethanolamine 109-85-3, 2-Methoxyethylamine 120-07-0, Phenylmethanolamine 122-20-3, Triisopropanolamine 122-96-3, 1,4-(Bis(2-hydroxyethyl)piperazine 622-40-2, 2-Morpholinoethanol 1615-14-1, 1H-Imidazole-1-ethanol 3040-44-6, 2-Piperidinoethanol 3445-11-2, 2-(2-Oxo-1-pyrrolidinyl)ethanol 6340-03-0, 1H-Benzimidazole-1-ethanol 17209-72-2 21987-32-6 64897-90-1 867257-43-0  
(preparation of nitrogen-containing organic compound for chemical amplified

resist composition)  
IT 79402-97-4P  
(proparation of nitrogen-containing organic compound for chemical amplified resist composition)  
IT 867257-44-1P  
(proparation of nitrogen-containing organic compound for chemical amplified resist composition)

L21 ANSWER 2 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STM

ACCESSION NUMBER: 2005:1023521 HCAPLUS

DOCUMENT NUMBER: 143:336181

TITLE: Cellulose acylate films useful for photographic and display applications and image display devices using them

INVENTOR(S): Kato, Eiichi

PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 68 pp.

CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2005255832	A2	20050922	JP 2004-68835	2004 0311
PRIORITY APPLN. INFO.:			JP 2004-68835	2004 0311

AB The films with good balance of brittle resistance and hardness, are made from a composition containing cellulose acylate and ≥1 water-insol. block copolymer having a polymerized portion derived from radical-polymerizable hydrophobic monomer(s) and a polymerized portion derived from radical-polymerizable hydrophilic monomer(s).

IT 865104-00-3P  
(assumed monomers; cellulose acylate films useful for photog. and display applications and image display devices using them)

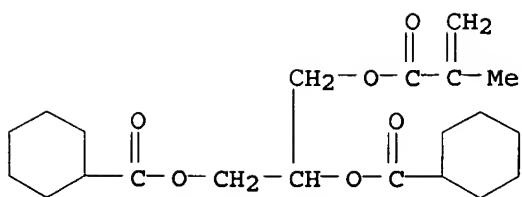
RN 865104-00-3 HCAPLUS

CN Cyclohexanecarboxylic acid, 1-[(2-methyl-1-oxo-2-propenyl)oxy]methyl]-1,2-ethanediyl ester, polymer with cyclohexyl 2-propenoate, 2-hydroxyethyl 2-methyl-2-propenoate, 2-(1H-imidazol-1-yl)ethyl 2-methyl-2-propenoate and 2-(phosphonoxy)ethyl 2-methyl-2-propenoate, block, graft (9CI) (CA INDEX NAME)

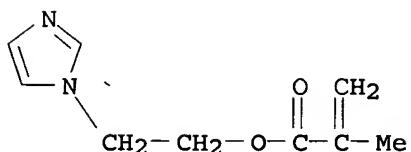
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CRN 865103-99-7

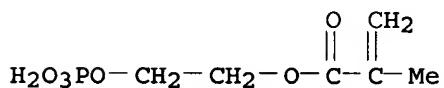
CMF C21 H32 O6



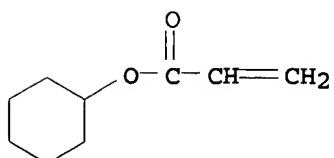
CM 2

CRN 62037-81-4  
CMF C9 H12 N2 O2

CM 3

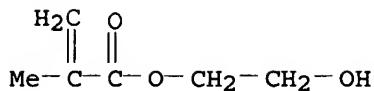
CRN 24599-21-1  
CMF C6 H11 O6 P

CM 4

CRN 3066-71-5  
CMF C9 H14 O2

CM 5

CRN 868-77-9  
CMF C6 H10 O3

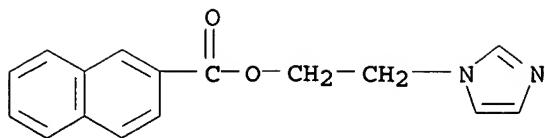


IC ICM C08L001-12  
 ICS B29C041-24; C08J005-18; G02B005-30; B29K001-00; B29L007-00  
 CC 74-2 (Radiation Chemistry, Photochemistry, and  
      Photographic and Other Reprographic Processes)  
 IT 865103-96-4P 865103-98-6P 865104-00-3P  
      (assumed monomers; cellulose acylate films useful for photog.  
      and display applications and image display devices using them)

L21 ANSWER 3 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 2005:429276 HCAPLUS  
 DOCUMENT NUMBER: 142:490393  
 TITLE: Nitrogen-containing organic compound,  
      resist composition and patterning  
      process  
 INVENTOR(S): Watanabe, Takeru; Kinsho, Takeshi; Hasegawa,  
                  Koji; Takemura, Katsuya; Noda, Kazumi;  
                  Kobayashi, Katsuhiro  
 PATENT ASSIGNEE(S): Shin-Etsu Chemical Co., Ltd., Japan  
 SOURCE: U.S. Pat. Appl. Publ., 31 pp.  
 CODEN: USXXCO  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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US 2005106500	A1	20050519	US 2004-984933	2004 1110
JP 2005165295	A2	20050623	JP 2004-324619	2004 1109
PRIORITY APPLN. INFO.:			JP 2003-384505	A 2003 1114

AB Chemical amplified resist compns. comprising  
 nitrogen-containing organic compds. having an aromatic carboxylic acid ester  
 structure have an excellent resolution and provide a precise pattern  
 profile and are useful in microfabrication using electron beams or  
 deep-UV light.  
 IT 851706-04-2P  
      (nitrogen-containing organic compound, resist composition and  
      patterning process)  
 RN 851706-04-2 HCAPLUS  
 CN 2-Naphthalenecarboxylic acid, 2-(1H-imidazol-1-yl)ethyl ester  
      (9CI) (CA INDEX NAME)



IC ICM G03C001-492

INCL 430270100

CC 74-5 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)

ST nitrogen org photoresist compn process

IT Photolithography

**Photoresists**

(nitrogen-containing organic compound, resist composition and patterning process)

IT 51-17-2, Benzimidazole 98-88-4, Benzoyl chloride 100-07-2,  
 4-Methoxybenzoyl chloride 102-71-6, Triethanolamine, reactions  
 527-69-5, 2-Furoyl chloride 622-40-2, 2-Morpholinoethanol  
 879-18-5, 1-Naphthoyl chloride 1615-14-1, 2-(Imidazol-1-  
 yl)ethanol 2243-83-6, 2-Naphthoyl chloride 2955-88-6,  
 2-(1-Pyrrolidinyl)ethanol 5452-06-2, 2-Chloroethyl  
 4-methoxybenzoate 6425-32-7, 3-Morpholinopropane-1,2-diol  
 14002-51-8, 4-Phenylbenzoyl chloride 17209-72-2 17213-57-9,  
 3,5-Dimethoxybenzoyl chloride 33941-15-0, 1-Aza-18-crown-6  
 79402-97-4 98998-43-7

(nitrogen-containing organic compound, resist composition and patterning process)

IT 22495-17-6P, 2-(1H-Benzimidazol-1-yl)ethyl benzoate 47750-79-8P  
 79690-87-2P 192817-77-9P, Ethyl 2-(1-pyrrolidinyl)benzoate  
 497057-34-8P 851705-95-8P 851705-97-0P 851705-99-2P  
 851706-00-8P 851706-01-9P 851706-02-0P 851706-03-1P  
 851706-04-2P 851706-05-3P 851706-06-4P 851706-07-5P

(nitrogen-containing organic compound, resist composition and patterning process)

L21 ANSWER 4 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2004:1019601 HCAPLUS

Appl'd

DOCUMENT NUMBER: 142:13680

TITLE: Basic compound, resist composition  
and patterning processINVENTOR(S): Watanabe, Takeru; Kinsho, Takeshi; Hasegawa,  
Koji

PATENT ASSIGNEE(S): Japan

SOURCE: U.S. Pat. Appl. Publ., 38 pp.

CODEN: USXXCO

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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US 2004234884	A1	20041125	US 2004-849186	2004 0520
JP 2004347736	A2	20041209	JP 2003-142813	2003

PRIORITY APPLN. INFO.:

JP 2003-142813

0521  
A  
2003  
0521

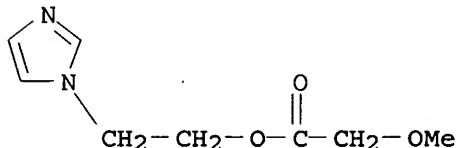
OTHER SOURCE(S) : MARPAT 142:13680

AB Resist compns. comprising basic compds. having an imidazole skeleton and a polar functional group have an excellent resolution and an excellent focus margin and are useful in microfabrication using electron beams or deep-UV light.

IT 798571-49-0P 798571-50-3P  
(basic compound; resist composition and patterning process)

RN 798571-49-0 HCPLUS

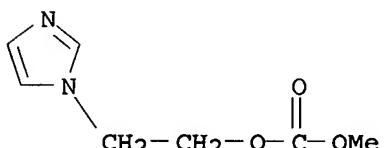
CN Acetic acid, methoxy-, 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



✓

RN 798571-50-3 HCPLUS

CN Carbonic acid, 2-(1H-imidazol-1-yl)ethyl methyl ester (9CI) (CA INDEX NAME)



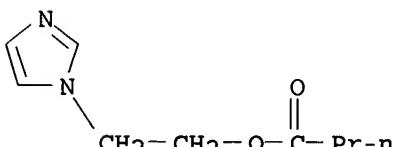
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IT 95360-46-6 95360-61-5 798571-59-2  
798571-60-5 798571-61-6 798571-62-7  
798571-63-8 798571-64-9 798571-65-0  
798571-66-1 798571-67-2 798571-68-3  
798571-69-4 798571-73-0

(basic compound; resist composition and patterning process)

RN 95360-46-6 HCPLUS

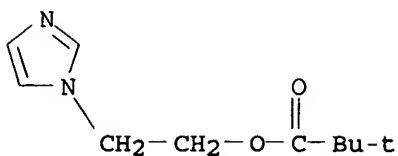
CN Butanoic acid, 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



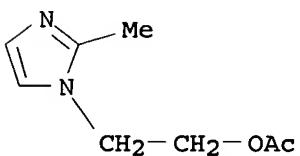
✓

RN 95360-61-5 HCPLUS

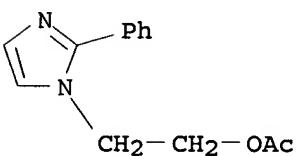
CN Propanoic acid, 2,2-dimethyl-, 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



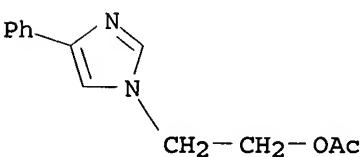
RN 798571-59-2 HCAPLUS  
 CN 1H-Imidazole-1-ethanol, 2-methyl-, acetate (ester) (9CI) (CA INDEX NAME)



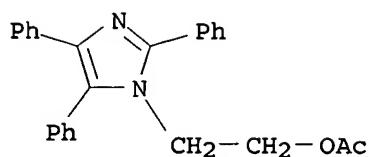
RN 798571-60-5 HCAPLUS  
 CN 1H-Imidazole-1-ethanol, 2-phenyl-, acetate (ester) (9CI) (CA INDEX NAME)



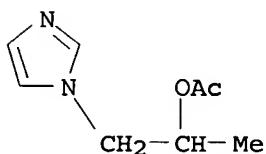
RN 798571-61-6 HCAPLUS  
 CN 1H-Imidazole-1-ethanol, 4-phenyl-, acetate (ester) (9CI) (CA INDEX NAME)



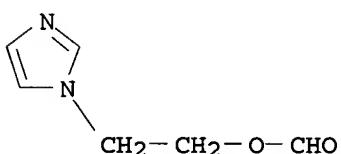
RN 798571-62-7 HCAPLUS  
 CN 1H-Imidazole-1-ethanol, 2,4,5-triphenyl-, acetate (ester) (9CI) (CA INDEX NAME)



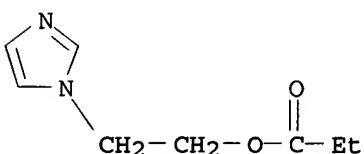
RN 798571-63-8 HCAPLUS  
 CN 1H-Imidazole-1-ethanol,  $\alpha$ -methyl-, acetate (ester) (9CI)  
 (CA INDEX NAME)



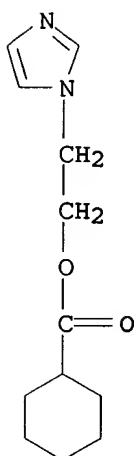
RN 798571-64-9 HCAPLUS  
 CN 1H-Imidazole-1-ethanol, formate (ester) (9CI) (CA INDEX NAME)



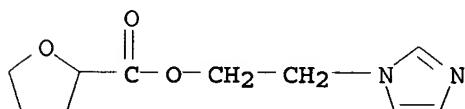
RN 798571-65-0 HCAPLUS  
 CN 1H-Imidazole-1-ethanol, propanoate (ester) (9CI) (CA INDEX NAME)



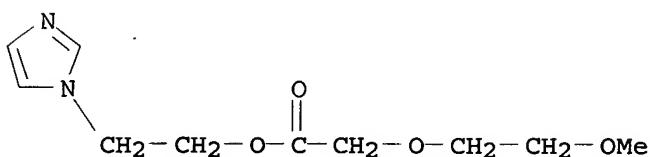
RN 798571-66-1 HCAPLUS  
 CN Cyclohexanecarboxylic acid, 2-(1H-imidazol-1-yl)ethyl ester (9CI)  
 (CA INDEX NAME)



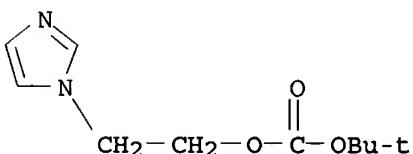
RN 798571-67-2 HCAPLUS  
 CN 2-Furancarboxylic acid, tetrahydro-, 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



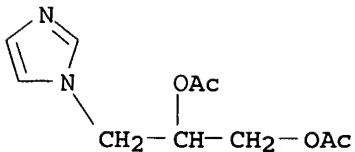
RN 798571-68-3 HCAPLUS  
 CN Acetic acid, (2-methoxyethoxy)-, 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



RN 798571-69-4 HCAPLUS  
 CN Carbonic acid, 1,1-dimethylethyl 2-(1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



RN 798571-73-0 HCAPLUS  
 CN 1,2-Propanediol, 3-(1H-imidazol-1-yl)-, diacetate (ester) (9CI) (CA INDEX NAME)



IC ICM G03C001-76  
 INCL 430141000; 430270100  
 CC 74-5 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)  
 ST basic compd resist compn patterning UV electron beam lithog  
 IT 1615-14-1P, 1H-Imidazole-1-ethanol 34793-28-7P 51755-51-2P  
 72338-57-9P 72338-63-7P, 1H-Imidazole-1-butanenitrile  
 72459-38-2P 195304-84-8P 798571-49-0P  
**798571-50-3P** 798571-51-4P  
     (basic compound; resist composition and patterning process)  
 IT 3001-72-7, 1,5-Diazabicyclo[4.3.0]-5-nonene 6674-22-2,  
 1,8-Diazabicyclo[5.4.0]-7-undecene 20734-58-1,  
 1,8-Bis(dimethylamino)naphthalene 95360-46-6  
 95360-61-5 148458-64-4 263389-34-0 798571-52-5  
 798571-53-6 798571-54-7 798571-55-8 798571-56-9  
 798571-57-0 798571-58-1 798571-59-2  
 798571-60-5 798571-61-6 798571-62-7  
 798571-63-8 798571-64-9 798571-65-0  
 798571-66-1 798571-67-2 798571-68-3  
 798571-69-4 798571-71-8 798571-72-9  
 798571-73-0 798571-74-1  
     (basic compound; resist composition and patterning process)  
 IT 70587-55-2  
     (crosslinker; resist composition and patterning process)  
 IT 138529-81-4 142342-33-4 144317-44-2 161453-44-7  
 266308-64-9  
     (photoacid generator; resist composition and patterning process)  
 IT 24979-74-6 123589-22-0 129674-22-2 158593-28-3 279243-86-6  
 326925-70-6 443796-30-3 645393-08-4 798570-36-2  
 798570-38-4 798570-39-5 798570-41-9 798570-42-0  
     (resin; resist composition and patterning process)  
 IT 351181-99-2P  
     (resist composition and patterning process)  
 IT 117458-06-7  
     (resist composition and patterning process)

L21 ANSWER 5 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 2004:842278 HCAPLUS  
 DOCUMENT NUMBER: 141:351533  
 TITLE: Magenta azo pigments for ink-jet inks  
 INVENTOR(S): Suzuki, Rihoko; Sugimoto, Kenichi; Matsuzaki, Yoriaki; Okuma, Tadashi; Oi, Ryu  
 PATENT ASSIGNEE(S): Mitsui Chemicals Inc., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 32 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2004285241	A2	20041014	JP 2003-79982	2003 0324
PRIORITY APPLN. INFO.:			JP 2003-79982	2003 0324
OTHER SOURCE(S): GI		MARPAT 141:351533		

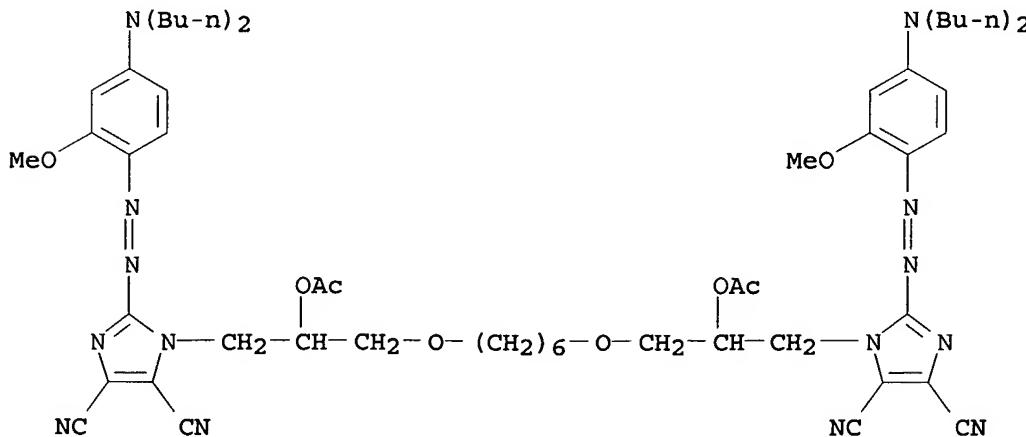
\* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT  
 \*

AB Azo pigments I [A = O-containing linking group; R1, R2 = H, halo, (un)substituted alkyl or alkoxy,  $\text{NHSO}_2\text{Q}_1$ ,  $\text{NHCOQ}_2$ ; Q1, Q2 = H, (un)substituted alkyl, alkoxy, aryl or aryloxy; R3, R4 = H, (un)substituted alkyl, aryl or alkenyl, where R3 and R4 may link with each other or with the adjacent aromatic ring to form a ring; n = 2, 3] having good solubility in organic solvents are prepared and used in ink-jet ink formulations. Thus, a magenta jet printing ink containing II 5, diethylene glycol monobutyl ether 10, and PhMe 85 parts showed no precipitation after 1-mo storage at 40° and gave images with high optical d. after water immersion or after 100-h accelerated weathering test.

IT 774224-72-5 774224-80-5  
 (magenta azo pigments for ink-jet inks with good storage stability and water and weather resistance)

RN 774224-72-5 HCAPLUS

CN 1H-Imidazole-4,5-dicarbonitrile, 1,1'-(1,6-hexanediylbis[oxy[2-(acetyloxy)-3,1-propanediyl]]])bis[2-[[4-(dibutylamino)-2-methoxyphenyl]azo]- (9CI) (CA INDEX NAME)

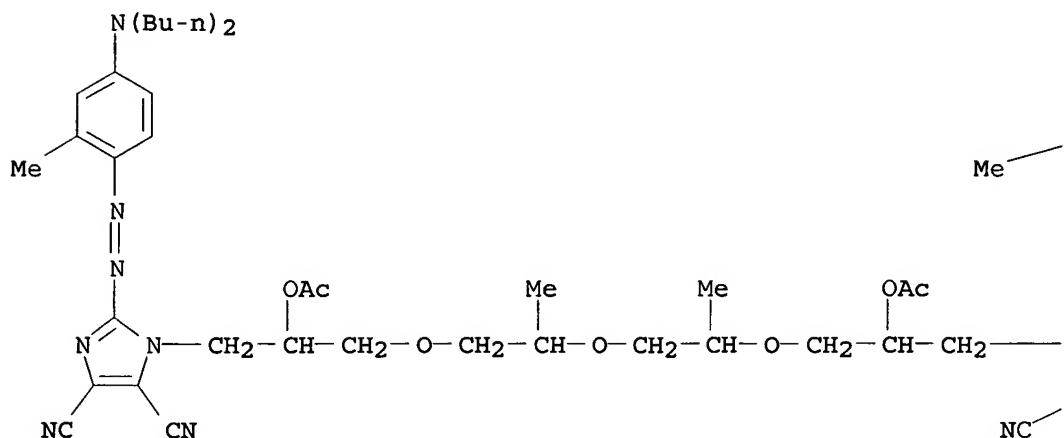


RN 774224-80-5 HCAPLUS

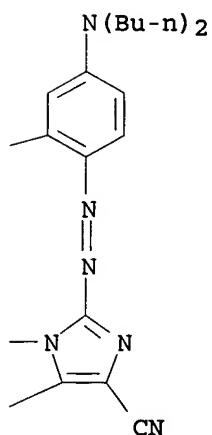
CN 1H-Imidazole-4,5-dicarbonitrile, 1,1'-(1-methyl-1,2-ethanediyl)bis[oxy[2-(acetyloxy)-3,1-propanediyl]]bis[2-[[4-

(dibutylamino)-2-methylphenylazo]- (9CI) (CA INDEX NAME)

PAGE 1-A



PAGE 1-B



IC ICM C09B035-025  
 ICS B41J002-01; B41M005-00; C07D233-90; C09B035-34; C09B043-00;  
 C09D011-00

CC 42-12 (Coatings, Inks, and Related Products)  
 Section cross-reference(s): 41

ST water weather resistance jet printing ink azo magenta  
 pigment; storage stability jet printing ink magenta azo pigment

IT Inks  
 (jet-printing, solvent-based; magenta azo pigments for ink-jet  
 inks with good storage stability and water and weather  
 resistance)

IT Inks  
 (jet-printing, water-thinned; magenta azo pigments for ink-jet  
 inks with good storage stability and water and weather  
 resistance)

IT 774224-69-0P 774224-70-3P

(magenta azo pigments for ink-jet inks with good storage stability and water and weather resistance)

IT 774224-71-4 774224-72-5 774224-73-6 774224-74-7  
 774224-75-8 774224-76-9 774224-77-0 774224-78-1  
 774224-79-2 774224-80-5 774224-81-6

(magenta azo pigments for ink-jet inks with good storage stability and water and weather resistance)

L21 ANSWER 6 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2004:798647 HCAPLUS

DOCUMENT NUMBER: 141:315977

TITLE: Magzenta azo pigments for ink-jet inks

INVENTOR(S): Suzuki, Rihoko; Okuma, Tadashi; Sugimoto, Kenichi; Oi, Ryu; Matsuzaki, Yoriaki

PATENT ASSIGNEE(S): Mitsui Chemicals Inc., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 27 pp.

CODEN: JKXXAF

DOCUMENT TYPE: Patent

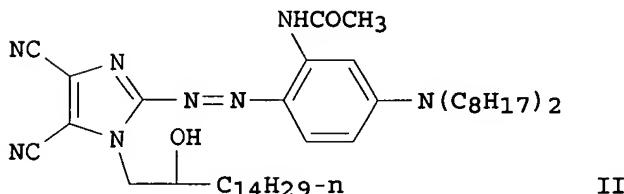
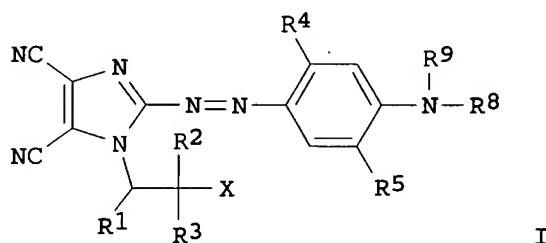
LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	-----	-----	-----	-----
JP 2004269619	A2	20040930	JP 2003-60125	2003 0306
PRIORITY APPLN. INFO.:			JP 2003-60125	2003 0306

OTHER SOURCE(S): MARPAT 141:315977  
 GI



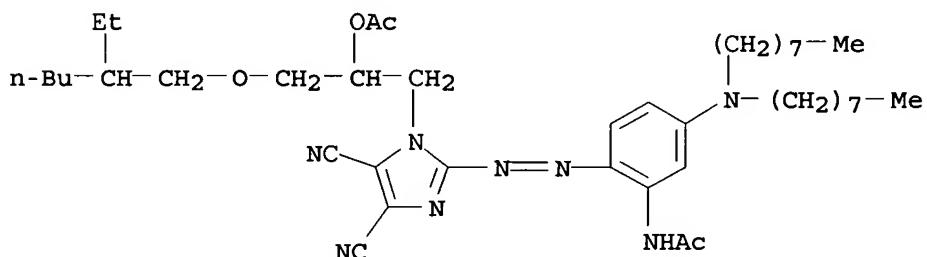
AB Azo pigments I [R1-R3 = H, (un)substituted alkyl, aryl or alkenyl, where R1 and R3 may link together to form a ring; R4, R5 = H, halo, (un)substituted alkyl or alkoxy, etc.; R8, R9 = H, (un)substituted alkyl or aryl, where R8 and R9 may link with each

other or with the adjacent aromatic ring to form a ring; X = OH, (un)substituted alkoxy or aryloxy, etc.] having good solubility in organic solvents are prepared and used in ink-jet ink formulations. Thus, a magenta jet printing ink containing II 5, diethylene glycol monobutyl ether 10, and PhMe 85 parts showed no precipitation after 1-mo storage at 40° and gave images with high optical d. after water immersion or after 100-h accelerated weathering test.

IT 766537-05-7P

(magenta azo pigments for ink-jet inks with good storage stability and water and weather resistance)

RN 766537-05-7 HCPLUS

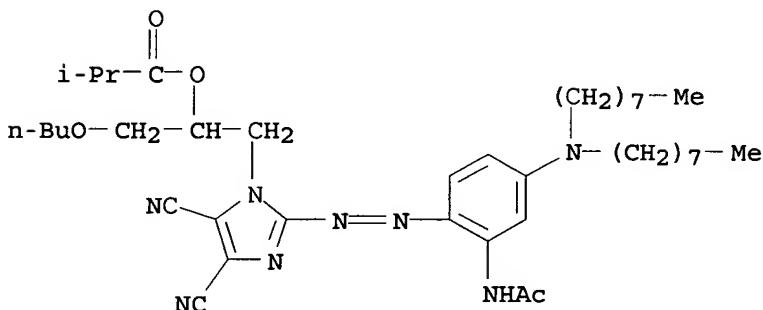
CN Acetamide, N-[2-[[1-[2-(acetyloxy)-3-[(2-ethylhexyl)oxy]propyl]-4,5-dicyano-1H-imidazol-2-yl]azo]-5-(dioctylamino)phenyl] - (9CI)  
(CA INDEX NAME)

IT 766537-12-6 766537-14-8

(magenta azo pigments for ink-jet inks with good storage stability and water and weather resistance)

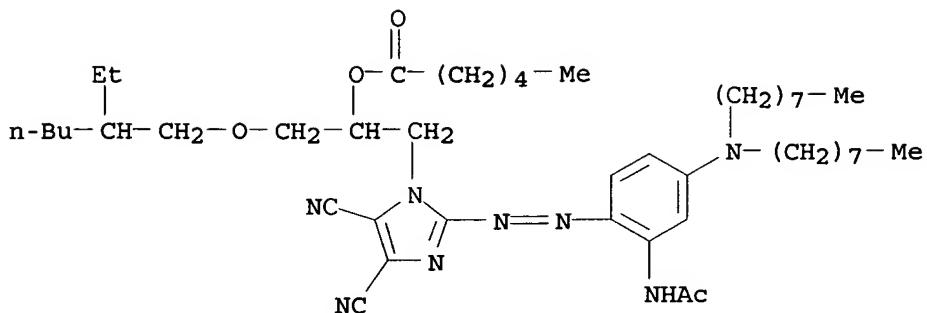
RN 766537-12-6 HCPLUS

CN Propanoic acid, 2-methyl-, 2-[2-[[2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]-1-(butoxymethyl)ethyl ester (9CI) (CA INDEX NAME)



RN 766537-14-8 HCPLUS

CN Hexanoic acid, 2-[2-[[2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]-1-[(2-ethylhexyl)oxy]methyl]ethyl ester (9CI) (CA INDEX NAME)



IC ICM C09B029-09  
 ICS B41J002-01; B41M005-00; C09B043-00; C09D011-00  
 CC 42-12 (Coatings, Inks, and Related Products)  
 Section cross-reference(s): 41  
 ST water weather resistance jet printing ink azo magenta  
 pigment; storage stability jet printing ink magenta azo pigment  
 IT Pigments, nonbiological  
     (azo; magenta azo pigments for ink-jet inks with good storage  
     stability and water and weather resistance)  
 IT Inks  
     (jet-printing, solvent-based; magenta azo pigments for ink-jet  
     inks with good storage stability and water and weather  
     resistance)  
 IT Inks  
     (jet-printing, water-thinned; magenta azo pigments for ink-jet  
     inks with good storage stability and water and weather  
     resistance)  
 IT 766537-04-6P  
     (magenta azo pigments for ink-jet inks with good storage  
     stability and water and weather resistance)  
 IT 766537-03-5P 766537-05-7P  
     (magenta azo pigments for ink-jet inks with good storage  
     stability and water and weather resistance)  
 IT 766537-06-8 766537-07-9 766537-08-0 766537-09-1  
 766537-10-4 766537-11-5 766537-12-6 766537-13-7  
 766537-14-8 767332-43-4  
     (magenta azo pigments for ink-jet inks with good storage  
     stability and water and weather resistance)

L21 ANSWER 7 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 2002:268665 HCAPLUS  
 DOCUMENT NUMBER: 136:311211  
 TITLE: Azo dyes and their use as magenta colorants  
       for color toners  
 INVENTOR(S): Matsuzaki, Yoriaki; Kogo, Osamu  
 PATENT ASSIGNEE(S): Mitsui Chemicals Inc., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 13 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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JP 2002105347

A2 20020410

JP 2000-293971

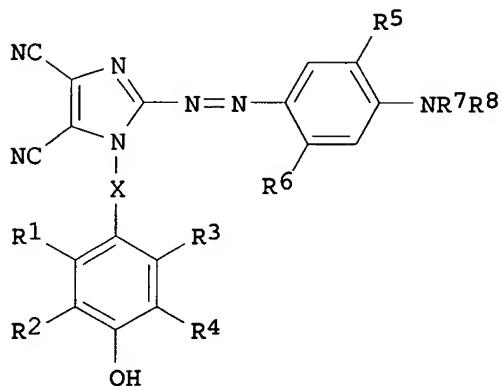
2000  
0927

PRIORITY APPLN. INFO.:

JP 2000-293971

2000  
0927OTHER SOURCE(S):  
GI

MARPAT 136:311211



AB The dyes are of I-type compds. (R1-4 = H, alkyl, 2H-benzotriazol-2-yl; R5, R6 = H, halogen, alkyl, alkoxy, aryl, carboxylate ester, carbonylamide, sulfamide, aminocarbonyl groups; R7, R8 = H, alkyl, aryl, alkenyl; R7 and R8 together can form a ring; X = linking groups). Thus, coupling a diazotized 2-aminoimidazole-4,5-dicarbonitrile with N-acetyl-N',N'-dioctyl-1,3-diaminobenzene gave an intermediate which (7.5 parts) was combined with N,N-dimethylimidolidinone 38, K carbonate 3 and KBr 0.4, heated to 80°, mixed with 3,5-di-tert-butyl-4-hydroxybenzyl alc. monochloroacetate 6.8 parts for 1 h and working up gave a dye with  $\lambda_{max}$  522 nm and gram absorption coefficient 66400 mL/g·cm for toner use.

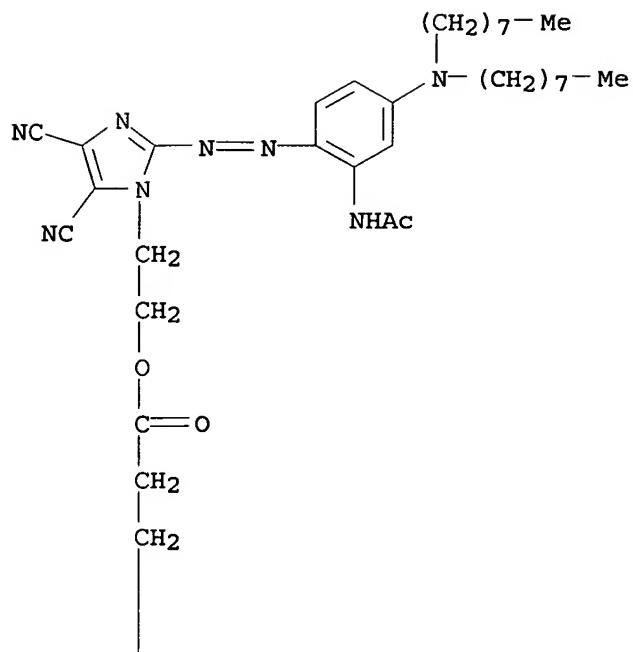
IT 410089-77-9P 410089-78-0P 410089-79-1P  
 410089-81-5P 410089-82-6P 410089-83-7P  
 410089-84-8P 410089-85-9P 410089-86-0P  
 410089-87-1P 410089-88-2P 410089-89-3P  
 410089-90-6P 410089-91-7P

(magenta colorant; azo dyes and use as magenta colorants for color toners)

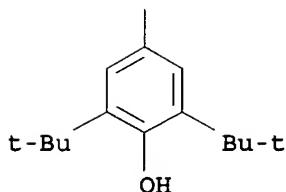
RN 410089-77-9 HCPLUS

CN Benzenepropanoic acid, 3,5-bis(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[(2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)

PAGE 1-A



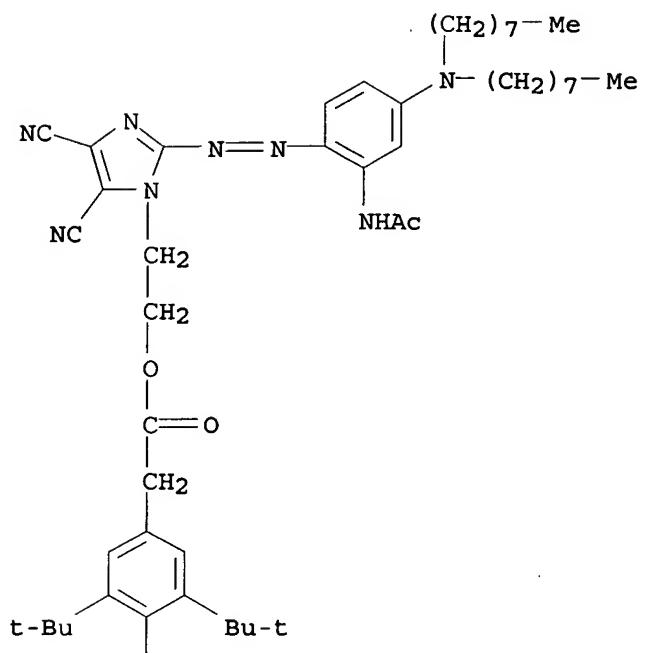
PAGE 2-A



RN 410089-78-0 HCAPLUS

CN Benzeneacetic acid, 3,5-bis(1,1-dimethylethyl)-4-hydroxy-,  
2-[2-[[2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)

PAGE 1-A

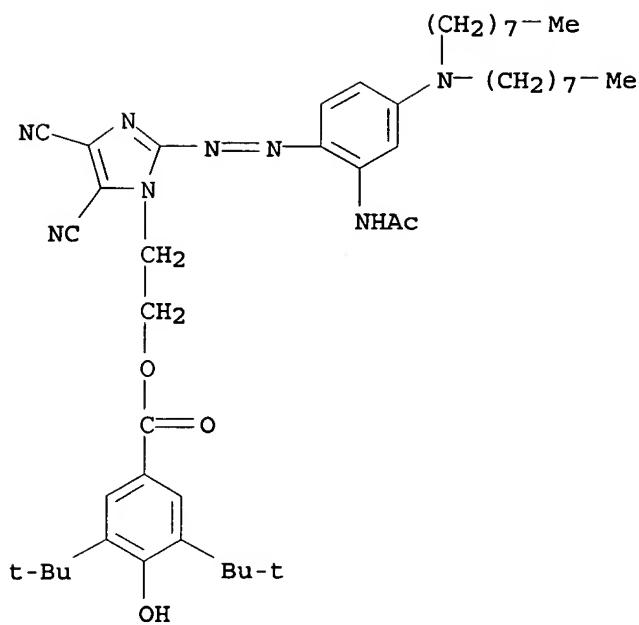


PAGE 2-A



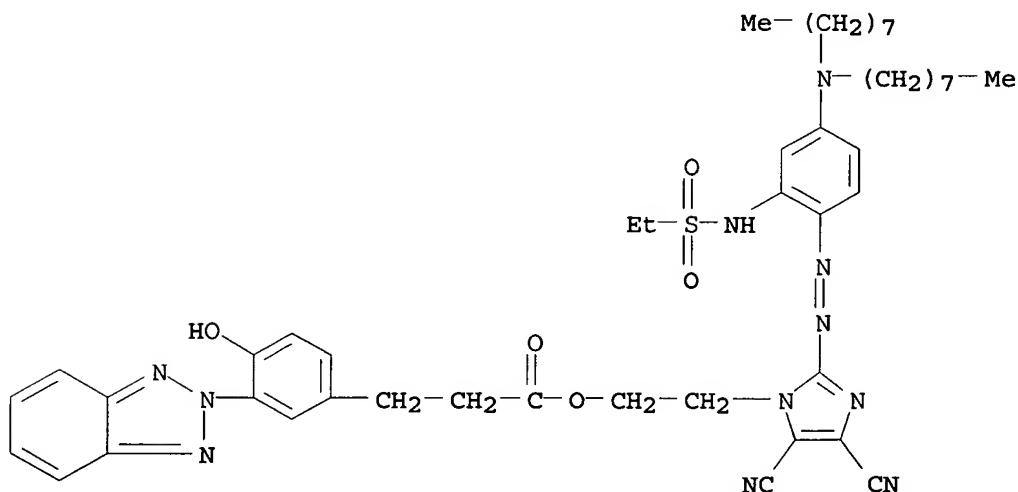
RN 410089-79-1 HCAPLUS

CN Benzoic acid, 3,5-bis(1,1-dimethylethyl)-4-hydroxy-,  
 2-[2-[[2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)



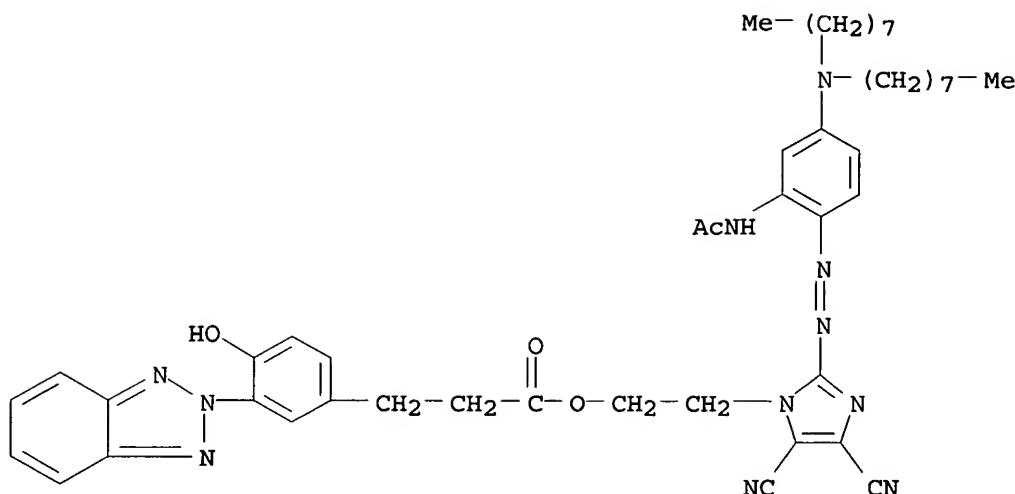
RN 410089-81-5 HCAPLUS

CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-4-hydroxy-,  
2-[4,5-dicyano-2-[[4-(dioctylamino)-2-  
[(ethylsulfonyl)amino]phenyl]azo]-1H-imidazol-1-yl]ethyl ester  
(9CI) (CA INDEX NAME)



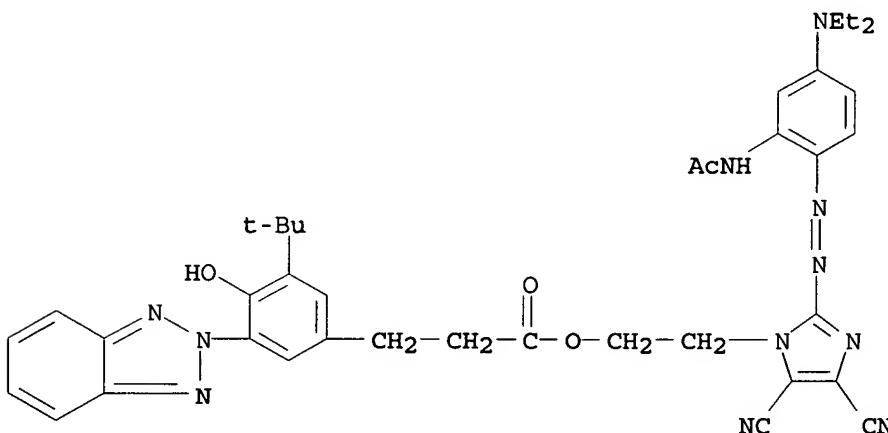
RN 410089-82-6 HCAPLUS

CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-4-hydroxy-,  
2-[2-[[2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-  
imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)



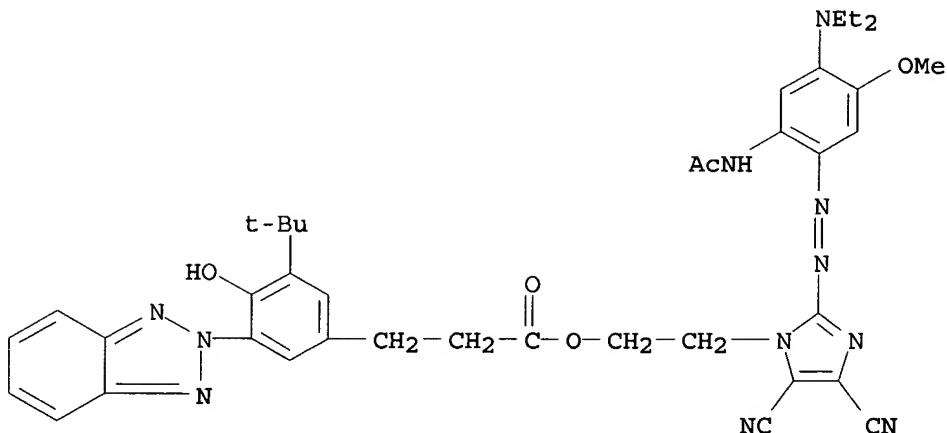
RN 410089-83-7 HCAPLUS

CN Benzenepropanoic acid, 3-[(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[(2-(acetylamino)-4-(diethylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester  
(9CI) (CA INDEX NAME)



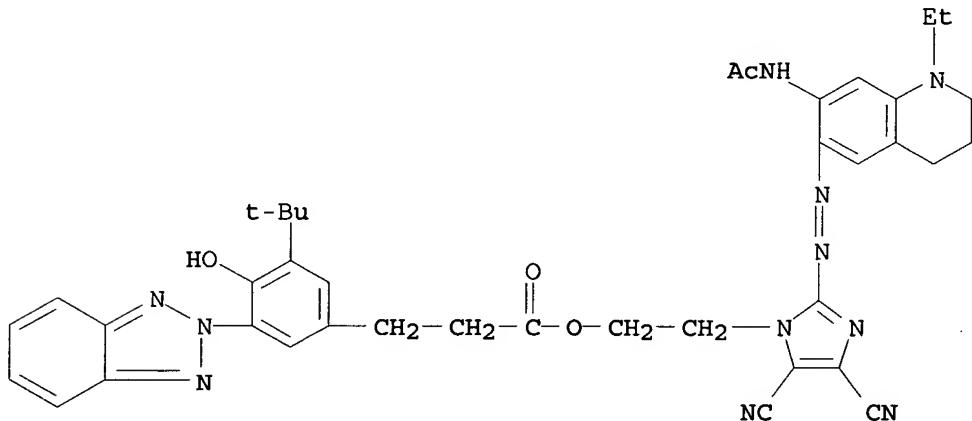
RN 410089-84-8 HCAPLUS

CN Benzenepropanoic acid, 3-[(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[(2-(acetylamino)-4-(diethylamino)-5-methoxyphenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester  
(9CI) (CA INDEX NAME)



RN 410089-85-9 HCAPLUS

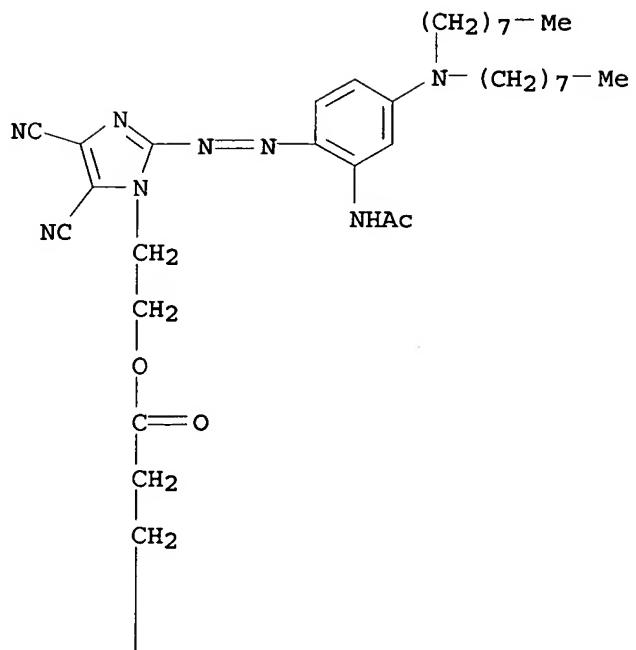
CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[[7-(acetylamino)-1-ethyl-1,2,3,4-tetrahydro-6-quinoliny]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)



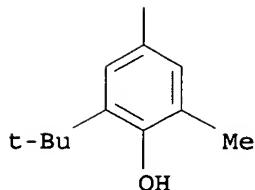
RN 410089-86-0 HCAPLUS

CN Benzenepropanoic acid, 3-(1,1-dimethylethyl)-4-hydroxy-5-methyl-, 2-[2-[[2-(acetylamino)-4-(dioctylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)

PAGE 1-A

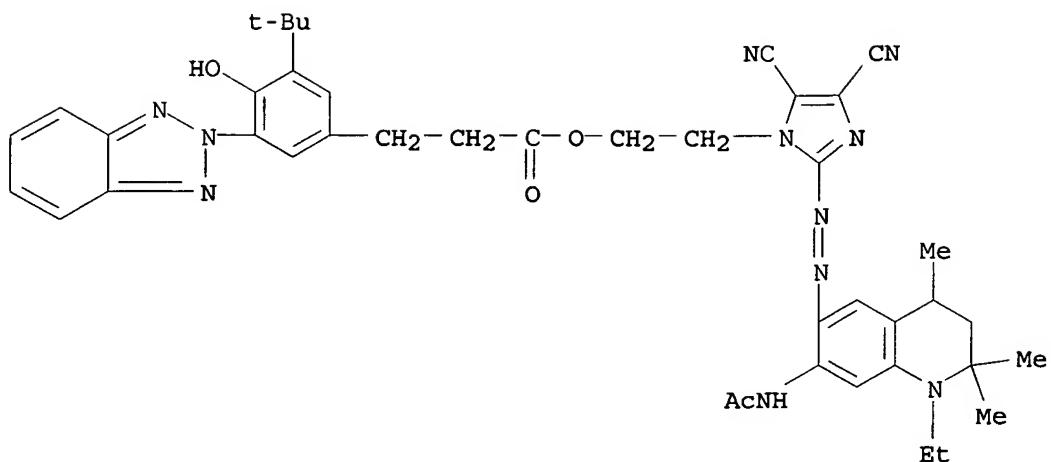


PAGE 2-A



RN 410089-87-1 HCAPLUS

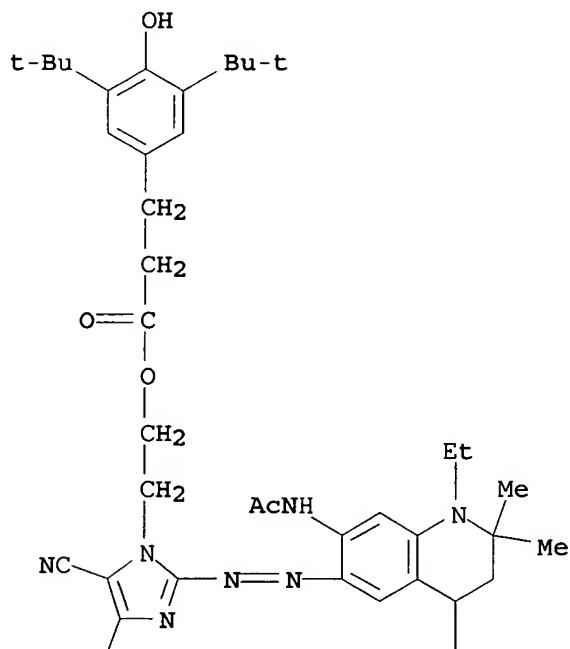
CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[[7-(acetylamino)-1-ethyl-1,2,3,4-tetrahydro-2,2,4-trimethyl-6-quinolinyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)



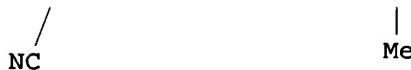
RN 410089-88-2 HCAPLUS

CN Benzenepropanoic acid, 3,5-bis(1,1-dimethylethyl)-4-hydroxy-,  
2-[2-[[7-(acetylamino)-1-ethyl-1,2,3,4-tetrahydro-2,2,4-trimethyl-  
6-quinolinyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI)  
(CA INDEX NAME)

PAGE 1-A



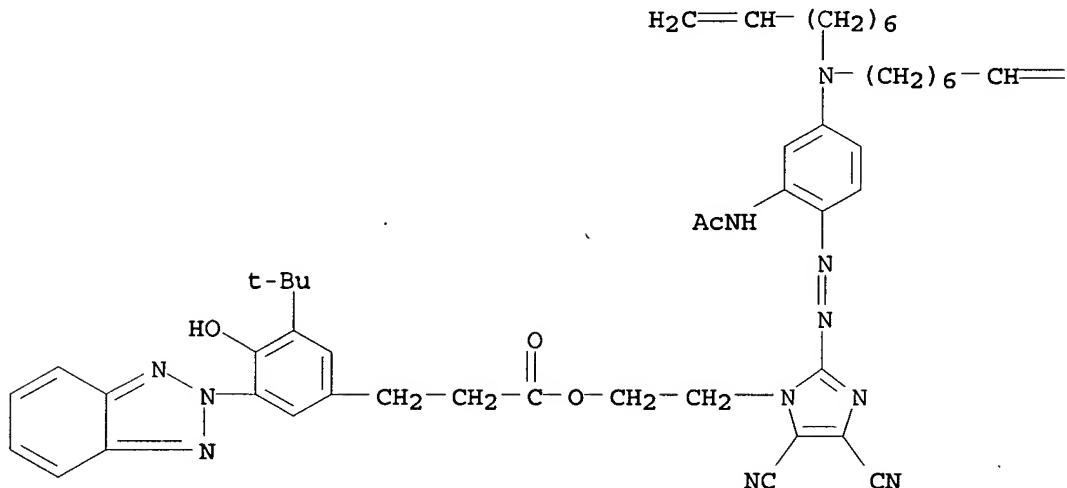
PAGE 2-A



RN 410089-89-3 HCAPLUS

CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[[2-(acetylamino)-4-(di-7-octenylamino)phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)

PAGE 1-A

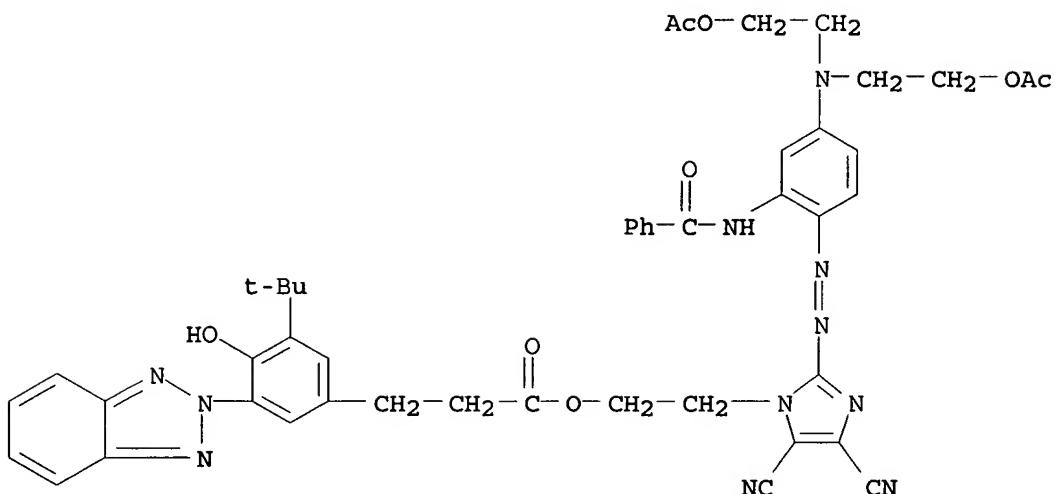


PAGE 1-B

=CH<sub>2</sub>

RN 410089-90-6 HCAPLUS

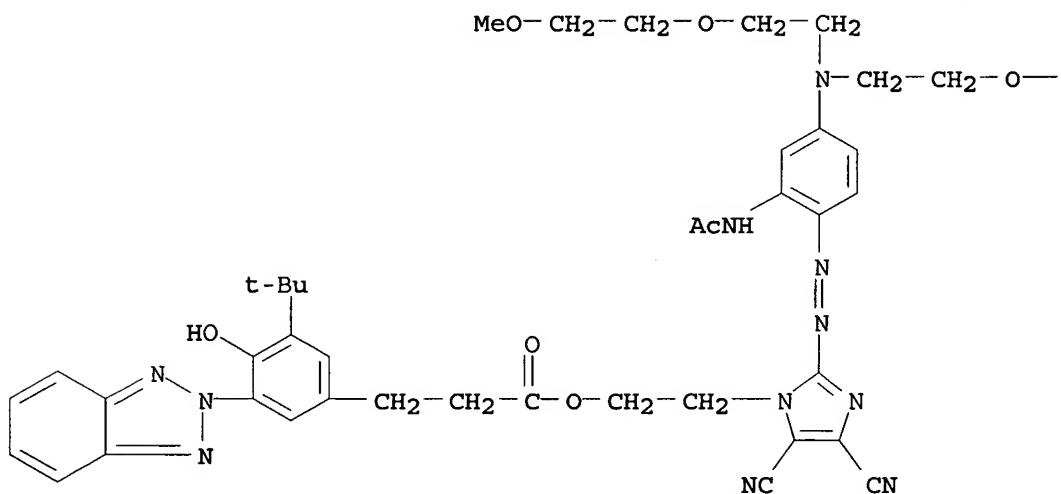
CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[[2-(benzoylamino)-4-[bis[2-(acetoxy)ethyl]amino]phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)



RN 410089-91-7 HCAPLUS

CN Benzenepropanoic acid, 3-(2H-benzotriazol-2-yl)-5-(1,1-dimethylethyl)-4-hydroxy-, 2-[2-[[2-(acetylamino)-4-[bis[2-(2-methoxyethoxy)ethyl]amino]phenyl]azo]-4,5-dicyano-1H-imidazol-1-yl]ethyl ester (9CI) (CA INDEX NAME)

PAGE 1-A



PAGE 1-B

— CH<sub>2</sub>— CH<sub>2</sub>— OMe

IC ICM C09B029-09

ICS C08K005-3445; C08L101-00; G03G009-09

CC 41-3 (Dyes, Organic Pigments, Fluorescent Brighteners, and Photographic Sensitizers)

## Section cross-reference(s) : 74

IT 77911-27-4P 410089-59-7P 410089-60-0P 410089-61-1P  
 410089-62-2P 410089-63-3P 410089-64-4P 410089-65-5P  
 410089-66-6P 410089-67-7P 410089-68-8P 410089-69-9P  
 410089-70-2P 410089-71-3P 410089-72-4P 410089-73-5P  
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 410089-81-5P 410089-82-6P 410089-83-7P  
 410089-84-8P 410089-85-9P 410089-86-0P  
 410089-87-1P 410089-88-2P 410089-89-3P  
 410089-90-6P 410089-91-7P

(magenta colorant; azo dyes and use as magenta colorants for color toners)

L21 ANSWER 8 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2001:524704 HCAPLUS

DOCUMENT NUMBER: 135:114408

TITLE: Photoelectrochemical cell comprising polymer electrolyte composition formed by polymerizing ionic liquid crystal monomer

INVENTOR(S): Ono, Michio

PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan

SOURCE: Eur. Pat. Appl., 43 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 1116769	A2	20010718	EP 2001-100999	2001 0117
JP 2001202995	A2	20010727	JP 2000-8054	2000 0117
US 2002034690	A1	20020321	US 2001-759363	2001 0116
US 6727023	B2	20040427	JP 2000-8054	A 2000 0117

PRIORITY APPLN. INFO.: MARPAT 135:114408

AB Disclosed is an electrolyte composition comprising a polymer compound formed by polymerizing an ionic liquid crystal monomer containing at least one polymerizable group. Also disclosed are an electrochem. cell, a nonaq. secondary cell and a photoelectrochem. cell, each comprising the electrolyte composition. In accordance with the present invention, an electrolyte which does not substantially volatilize and exhibits excellent charge-transporting properties can be obtained, making it possible to obtain a photoelectrochem. cell having excellent photoelec. conversion properties and less deterioration of properties with time. Further, a lithium ion-conducting material having an extremely high ionic conductivity at

low temps. can be obtained.

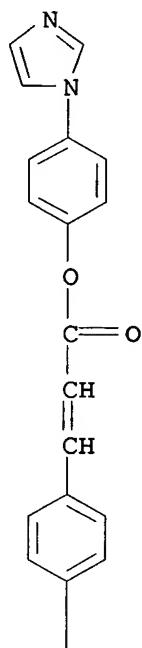
IT 350507-50-5P

(in preparation of ionic liquid crystal monomer containing polymerizable group)

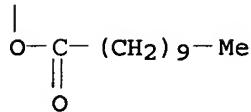
RN 350507-50-5 HCAPLUS

CN Undecanoic acid, 4-[3-[4-(1H-imidazol-1-yl)phenoxy]-3-oxo-1-propenyl]phenyl ester (9CI) (CA INDEX NAME)

PAGE 1-A



PAGE 2-A



IC ICM C09K019-00

ICS C09K019-38; H01G009-20

CC 74-1 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)

Section cross-reference(s): 72

IT 42749-27-9P 42749-28-0P 85689-41-4P 118798-05-3P

136399-07-0P 139475-37-9P 155062-34-3P 188915-80-2P

261508-74-1P 307558-21-0P 350507-45-8P 350507-46-9P

350507-47-0P 350507-48-1P 350507-49-2P 350507-50-5P

(in preparation of ionic liquid crystal monomer containing polymerizable group)

L21 ANSWER 9 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2001:62567 HCAPLUS

DOCUMENT NUMBER: 134:132600  
 TITLE: Radiation-curable resin compositions for  
       making color filters  
 INVENTOR(S): Sakurai, Koichi; Watanabe, Takeshi  
 PATENT ASSIGNEE(S): JSR Co., Ltd., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 17 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2001021713	A2	20010126	JP 1999-189882	
				1999
				0705
PRIORITY APPLN. INFO.:			JP 1999-189882	
				1999
				0705

OTHER SOURCE(S): MARPAT 134:132600

AB The comps. comprise (A) colorants, (B) alkali-soluble resins, (C) polyfunctional monomers, (D) (meth)acrylate esters bearing imidazolyl groups, and (E) photoinitiators. Thus, mixing a C.I. Pigment Red 177/C.I. Pigment Red 224 65:35 mixture 100 with a benzyl methacrylate-glycerol monomethacrylate-methacrylic acid-N-phenylmaleimide-styrene copolymer 70, dipentaerythritol hexaacrylate 80, 2-(2'-methylimidazolyl)ethyl methacrylate 10, 2-benzyl-2-dimethylamino-1-(4-morpholinophenyl)-1-butanone 50 and propylene glycol monomethyl ether acetate 1000 parts, coating the resulting mixture on the surface of a soda glass, pre-baking, irradiating with UV light via a photomask, developing in a KOH solution, washing and post baking gave a color filter.

IT 321849-21-2, Benzyl methacrylate-dipentaerythritol hexaacrylate-glycerol monomethacrylate-2-(2'-methylimidazolyl)ethyl methacrylate-methacrylic acid-N-phenylmaleimide-styrene copolymer 321849-22-3, Benzyl methacrylate-dipentaerythritol hexaacrylate-2-(2-methyl-1-imidazolyl)ethyl methacrylate-methacrylic acid-styrene copolymer 321849-24-5 321849-25-6  
 (radiation-curable resin compns. for making color filters)

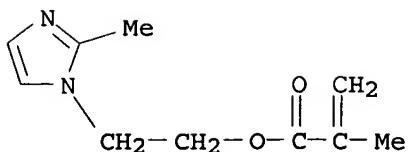
RN 321849-21-2 HCPLUS

CN 2-Propenoic acid, 2-methyl-, polymer with ethenylbenzene, 2-(2-methyl-1H-imidazol-1-yl)ethyl 2-methyl-2-propenoate, 2-[[3-[(1-oxo-2-propenyl)oxy]-2,2-bis[[[1-oxo-2-propenyl]oxy]methyl]propoxy]methyl]-2-[[[(1-oxo-2-propenyl)oxy]methyl]-1,3-propanediyl di-2-propenoate, phenylmethyl 2-methyl-2-propenoate, 1-phenyl-1H-pyrrole-2,5-dione and 1,2,3-propanetriol mono(2-methyl-2-propenoate) (9CI) (CA INDEX NAME)

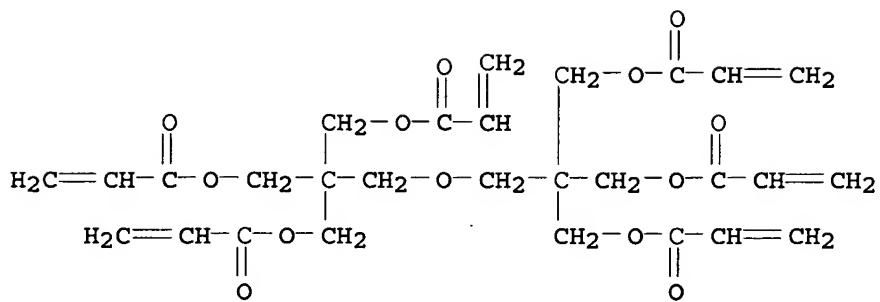
CM 1

CRN 34375-24-1

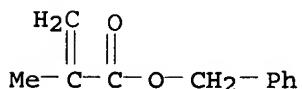
CMF C10 H14 N2 O2



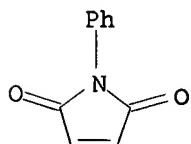
CM 2

CRN 29570-58-9  
CMF C28 H34 O13

CM 3

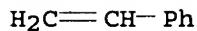
CRN 2495-37-6  
CMF C11 H12 O2

CM 4

CRN 941-69-5  
CMF C10 H7 N O2

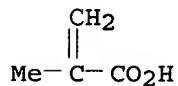
CM 5

CRN 100-42-5  
CMF C8 H8



CM 6

CRN 79-41-4  
 CMF C4 H6 O2

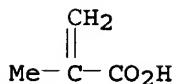


CM 7

CRN 50853-28-6  
 CMF C7 H12 O4  
 CCI IDS

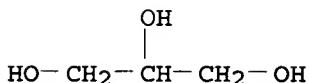
CM 8

CRN 79-41-4  
 CMF C4 H6 O2



CM 9

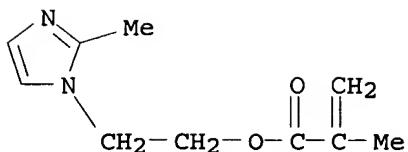
CRN 56-81-5  
 CMF C3 H8 O3



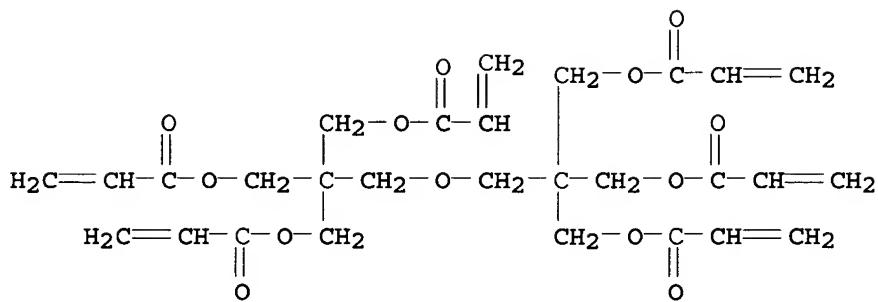
RN 321849-22-3 HCPLUS  
 CN 2-Propenoic acid, 2-methyl-, polymer with ethenylbenzene,  
 2-(2-methyl-1H-imidazol-1-yl)ethyl 2-methyl-2-propenoate,  
 2-[3-[(1-oxo-2-propenyl)oxy]-2,2-bis[[[1-oxo-2-  
 propenyl)oxy]methyl]propoxy]methyl]-2-[[[1-oxo-2-  
 propenyl)oxylmethyl]-1,3-propanediyl di-2-propenoate and  
 phenylmethyl 2-methyl-2-propenoate (9CI) (CA INDEX NAME)

CM 1

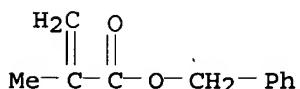
CRN 34375-24-1  
 CMF C10 H14 N2 O2



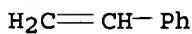
CM 2

CRN 29570-58-9  
CMF C28 H34 O13

CM 3

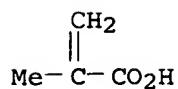
CRN 2495-37-6  
CMF C11 H12 O2

CM 4

CRN 100-42-5  
CMF C8 H8

CM 5

CRN 79-41-4  
CMF C4 H6 O2



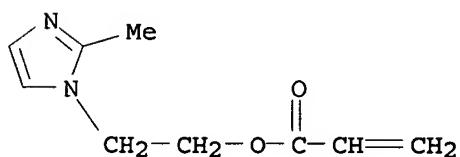
RN 321849-24-5 HCAPLUS

CN 2-Propenoic acid, 2-methyl-, polymer with ethenylbenzene,  
 $\alpha$ -hydro- $\omega$ -[(1-oxo-2-propenyl)oxy]poly[oxy(1-oxo-1,6-hexanediyl)], 2-(2-methyl-1H-imidazol-1-yl)ethyl 2-propenoate, 2-[[3-[(1-oxo-2-propenyl)oxy]-2,2-bis[[[(1-oxo-2-propenyl)oxy]methyl]propoxy]methyl]-2-[[[(1-oxo-2-propenyl)oxy]methyl]-1,3-propanediyl di-2-propenoate, phenylmethyl 2-methyl-2-propenoate, 1-phenyl-2H-pyrrole-2,5-dione and 1,2,3-propanetriol mono(2-methyl-2-propenoate), graft (9CI) (CA INDEX NAME)

CM 1

CRN 321849-23-4

CMF C9 H12 N2 O2

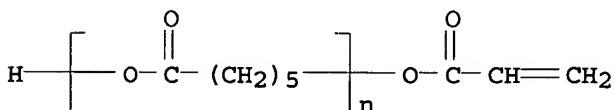


CM 2

CRN 97387-29-6

CMF (C6 H10 O2)n C3 H4 O2

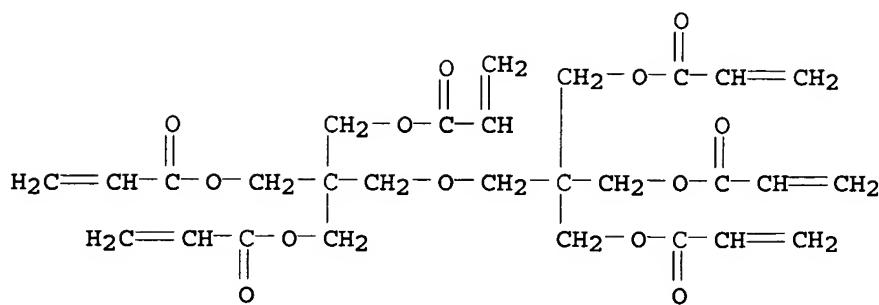
CCI PMS



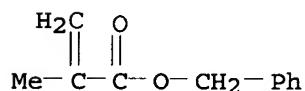
CM 3

CRN 29570-58-9

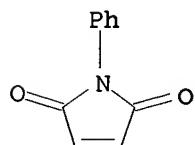
CMF C28 H34 O13



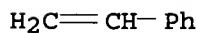
CM 4

CRN 2495-37-6  
CMF C11 H12 O2

CM 5

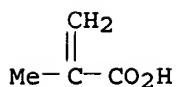
CRN 941-69-5  
CMF C10 H7 N O2

CM 6

CRN 100-42-5  
CMF C8 H8

CM 7

CRN 79-41-4  
CMF C4 H6 O2

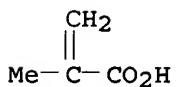


CM 8

CRN 50853-28-6  
 CMF C7 H12 O4  
 CCI IDS

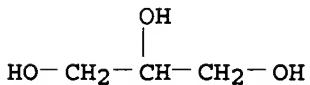
CM 9

CRN 79-41-4  
 CMF C4 H6 O2



CM 10

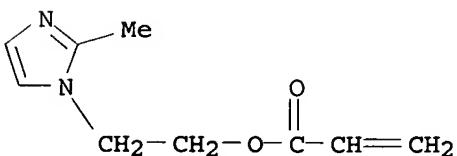
CRN 56-81-5  
 CMF C3 H8 O3



RN 321849-25-6 HCAPLUS  
 CN 2-Propenoic acid, 2-methyl-, polymer with ethenylbenzene,  
 2-(2-methyl-1H-imidazol-1-yl)ethyl 2-propenoate, 2-oxepanone,  
 2-[[3-[(1-oxo-2-propenyl)oxy]-2,2-bis[[1-oxo-2-  
 propenyl]oxy]methyl]propoxy]methyl]-2-[[[(1-oxo-2-  
 propenyl)oxy]methyl]-1,3-propanediyl di-2-propenoate, phenylmethyl  
 2-methyl-2-propenoate, 1-phenyl-1H-pyrrole-2,5-dione and  
 1,2,3-propanetriol mono(2-methyl-2-propenoate), graft (9CI) (CA  
 INDEX NAME)

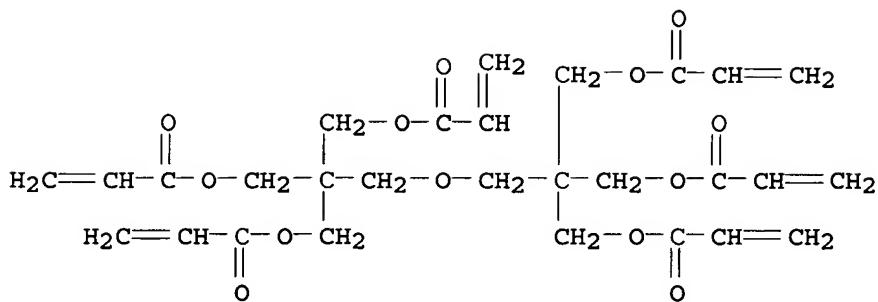
CM 1

CRN 321849-23-4  
 CMF C9 H12 N2 O2



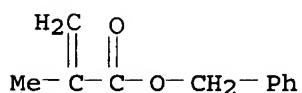
CM 2

CRN 29570-58-9  
 CMF C28 H34 O13



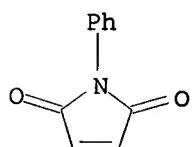
CM 3

CRN 2495-37-6  
 CMF C11 H12 O2



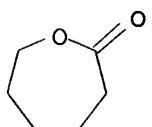
CM 4

CRN 941-69-5  
 CMF C10 H7 N O2



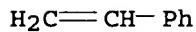
CM 5

CRN 502-44-3  
 CMF C6 H10 O2



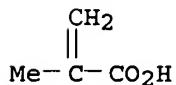
CM 6

CRN 100-42-5  
 CMF C8 H8



CM 7

CRN 79-41-4  
 CMF C4 H6 O2

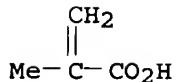


CM 8

CRN 50853-28-6  
 CMF C7 H12 O4  
 CCI IDS

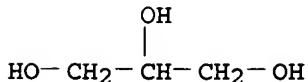
CM 9

CRN 79-41-4  
 CMF C4 H6 O2



CM 10

CRN 56-81-5  
 CMF C3 H8 O3



IC ICM G02B005-20

ICS C08F002-48; C08F291-06; G03F007-004; G03F007-027; G03F007-032

CC 38-3 (Plastics Fabrication and Uses)

Section cross-reference(s): 74, 76

IT 321849-21-2, Benzyl methacrylate-dipentaerythritol  
 hexaacrylate-glycerol monomethacrylate-2-(2'-  
 methylimidazolyl)ethyl methacrylate-methacrylic  
 acid-N-phenylmaleimide-styrene copolymer 321849-22-3,

Benzyl methacrylate-dipentaerythritol hexaacrylate-2-(2-methyl-1-imidazolyl)ethyl methacrylate-methacrylic acid-styrene copolymer  
 321849-24-5 321849-25-6  
 (radiation-curable resin compns. for making color filters)

L21 ANSWER 10 OF 23 HCPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 2001:46045 HCPLUS  
 DOCUMENT NUMBER: 134:123652  
 TITLE: Radiation-sensitive compositions giving patterns with high hardness and color filters using them  
 INVENTOR(S): Sakurai, Koichi; Watanabe, Takeshi  
 PATENT ASSIGNEE(S): JSR Co., Ltd., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 21 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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JP 2001013313	A2	20010119	JP 1999-183052	1999
				0629
PRIORITY APPLN. INFO.:			JP 1999-183052	1999
				0629

AB The compns. contain (A) coloring agents, (B) alkali-soluble polymers containing copolymers of 1-[CH<sub>2</sub>:CR<sub>1</sub>CO<sub>2</sub>(CH<sub>2</sub>)<sub>n</sub>]-2-R<sub>2</sub>-imidazole (R<sub>1</sub> = H, Me; R<sub>2</sub> = H, C<sub>1-5</sub> alkyl; n = 1-5) and other monomers, (C) polyfunctional monomers, and (D) photopolymn. initiators. The color filters have pixels obtained from them. The filters are useful for liquid-crystal displays, image-pickup devices, etc. The compns. give pixels with high solvent resistance and good adhesion to substrates and light-shielding layers.

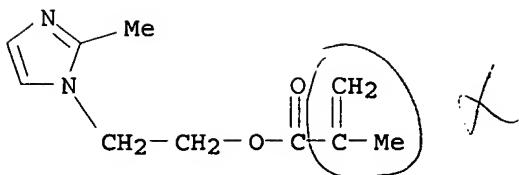
IT 320730-33-4, Benzyl methacrylate-2-hydroxyethyl methacrylate-methacrylic acid-1-(2-methacryloyloxyethyl)-2-methylimidazole copolymer 320730-35-6, Benzyl methacrylate-methacrylic acid-1-(2-methacryloyloxyethyl)-2-methylimidazole-N-phenylmaleimide-styrene copolymer (radiation-sensitive compns. giving solvent-resistant pixels for color filters)

RN 320730-33-4 HCPLUS

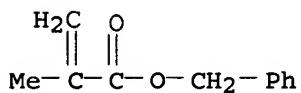
CN 2-Propenoic acid, 2-methyl-, polymer with 2-hydroxyethyl 2-methyl-2-propenoate, 2-(2-methyl-1H-imidazol-1-yl)ethyl 2-methyl-2-propenoate and phenylmethyl 2-methyl-2-propenoate (9CI) (CA INDEX NAME)

CM 1

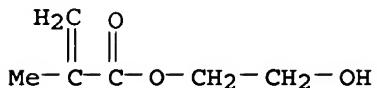
CRN 34375-24-1  
CMF C10 H14 N2 O2



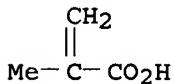
CM 2

CRN 2495-37-6  
CMF C11 H12 O2

CM 3

CRN 868-77-9  
CMF C6 H10 O3

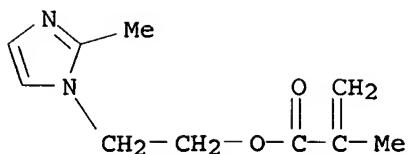
CM 4

CRN 79-41-4  
CMF C4 H6 O2

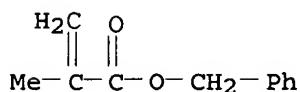
RN 320730-35-6 HCPLUS  
 CN 2-Propenoic acid, 2-methyl-, polymer with ethenylbenzene,  
 2-(2-methyl-1H-imidazol-1-yl)ethyl 2-methyl-2-propenoate,  
 phenylmethyl 2-methyl-2-propenoate and 1-phenyl-1H-pyrrole-2,5-dione (9CI) (CA INDEX NAME)

CM 1

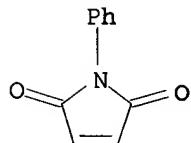
CRN 34375-24-1  
CMF C10 H14 N2 O2



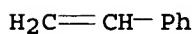
CM 2

CRN 2495-37-6  
CMF C11 H12 O2

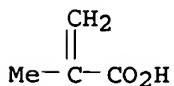
CM 3

CRN 941-69-5  
CMF C10 H7 N O2

CM 4

CRN 100-42-5  
CMF C8 H8

CM 5

CRN 79-41-4  
CMF C4 H6 O2

IC ICM G02B005-20  
ICS G03F007-004; G03F007-027; G03F007-028; G03F007-033;  
G02F001-1335

CC 74-13 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)  
 Section cross-reference(s): 38, 73

ST radiation sensitive alkali soluble imidazole polymer; color filter  
 radiation sensitive imidazole polymer; hardness imidazole polymer  
 pattern color filter; solvent resistance imidazole  
 polymer pattern color filter; liq crystal display filter imidazole  
 polymer pattern

IT Liquid crystal displays  
 Optical filters  
 (radiation-sensitive compns. giving solvent-resistant pixels for color filters)

IT 67653-78-5P, Dipentaerythritol hexaacrylate homopolymer  
 (radiation-sensitive compns. giving solvent-resistant pixels for color filters)

IT 320730-33-4, Benzyl methacrylate-2-hydroxyethyl methacrylate-methacrylic acid-1-(2-methacryloyloxyethyl)-2-methylimidazole copolymer 320730-35-6, Benzyl methacrylate-methacrylic acid-1-(2-methacryloyloxyethyl)-2-methylimidazole-N-phenylmaleimide-styrene copolymer 320730-38-9  
 (radiation-sensitive compns. giving solvent-resistant pixels for color filters)

IT 29570-58-9, Dipentaerythritol hexaacrylate  
 (radiation-sensitive compns. giving solvent-resistant pixels for color filters)

L21 ANSWER 11 OF 23 HCPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2000:839116 HCPLUS

DOCUMENT NUMBER: 134:18658

TITLE: Azo colorant, colored fine particles and dispersion for aqueous ink for ink jet recording

INVENTOR(S): Matsuzaki, Yoriaki; Oi, Ryu; Okuma, Tadashi; Kohgo, Osamu

PATENT ASSIGNEE(S): Mitsui Chemicals, Inc., Japan

SOURCE: Eur. Pat. Appl., 27 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 1055712	A2	20001129	EP 2000-304377	2000 0524
EP 1055712	A3	20020109		
EP 1055712	B1	20050216		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO				
JP 2001040235	A2	20010213	JP 2000-141110	2000 0515
TW 554013	B	20030921	TW 2000-89110015	2000 0524
CN 1281015	A	20010124	CN 2000-120087	2000

PRIORITY APPLN. INFO.:

JP 1999-144970

0525  
A  
1999  
0525

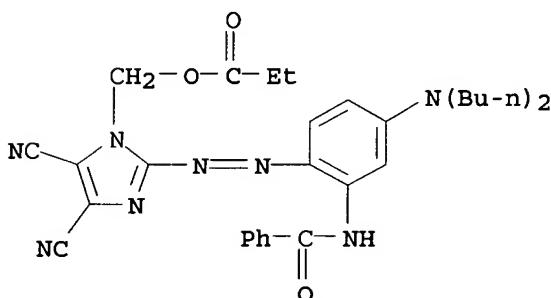
OTHER SOURCE(S): MARPAT 134:18658

AB Aqueous ink for ink jet recording contains  $\geq 1$  water-insol. coloring matter, H<sub>2</sub>O and a resin emulsion, the azo colorant is excellent in storage stability, H<sub>2</sub>O and light resistance and compatibility with the resin. A dispersion of polyester 100, MEK 150, THF 150, and colorant 10 parts was added to glycerin and water to form an ink for jet printing of dense (OD >1.1) images having water and lightfastness.

IT 310445-20-6 310445-21-7  
(colorant; in aqueous ink for ink jet recording of images having water and lightfastness)

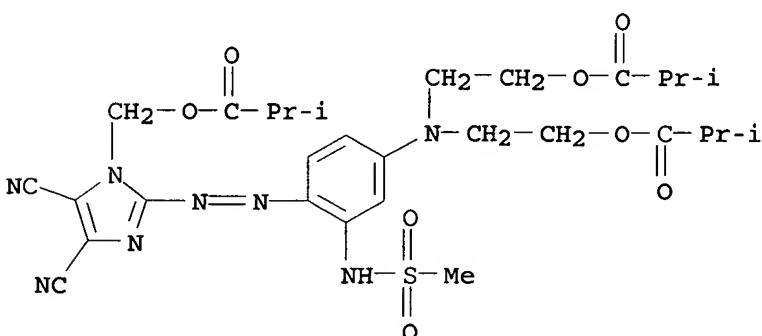
RN 310445-20-6 HCAPLUS

CN Benzamide, N-[5-(dibutylamino)-2-[[4,5-dicyano-1-[(1-oxopropoxy)methyl]-1H-imidazol-2-yl]azo]phenyl]- (9CI) (CA INDEX NAME)



RN 310445-21-7 HCAPLUS

CN Propanoic acid, 2-methyl-, [[4-[[4,5-dicyano-1-[(2-methyl-1-oxopropoxy)methyl]-1H-imidazol-2-yl]azo]-3-[(methylsulfonyl)amino]phenyl]imino]di-2,1-ethanediyl ester (9CI) (CA INDEX NAME)



IC ICM C09D011-02

ICS C09D011-10; C09B029-09

CC 42-12 (Coatings, Inks, and Related Products)  
Section cross-reference(s): 41

IT 310445-05-7 310445-07-9 310445-09-1 310445-10-4  
 310445-11-5 310445-12-6 310445-13-7 310445-14-8  
 310445-15-9 310445-16-0 310445-17-1 310445-18-2  
 310445-19-3 310445-20-6 310445-21-7  
 310445-22-8 310445-23-9 310445-24-0 310445-25-1  
 310445-26-2 310445-27-3 310445-28-4 310445-29-5  
 310445-30-8 310445-31-9 310445-32-0 310445-33-1  
 310445-34-2 310445-35-3 310445-36-4 310445-37-5  
 310445-38-6 310445-39-7 310445-40-0  
 (colorant; in aqueous ink for ink jet recording of images having  
 water and lightfastness)

L21 ANSWER 12 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2000:817497 HCAPLUS

DOCUMENT NUMBER: 134:6950

TITLE: Electrolytes, liquid crystalline compositions,  
 liquid crystalline compounds, liquid  
 crystalline mixtures, batteries, and  
 photovoltaic cells

INVENTOR(S): Ono, Michio

PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 41 pp.

CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2000319260	A2	20001121	JP 2000-53711	2000 0229
EP 1033731	A2	20000906	EP 2000-103822	2000 0223
EP 1033731	A3	20040225		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL				
US 6495067	B1	20021217	US 2000-516628	2000 0301
PRIORITY APPLN. INFO.:			JP 1999-53162	A 1999 0301
			JP 1999-55636	A 1999 0303

OTHER SOURCE(S): MARPAT 134:6950  
 GI

\* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT  
 \*

AB Claimed electrolytes comprise liquid crystalline compds. I [R111 is (substituted) alkyl, alkenyl; Z111 forms 5- or 6-membered aromatic ring cation with N; R121 is a substituent containing  $\geq 1$  ring and alkyl or alkenyl to give liquid crystalline property; X111- is an anion]. Claimed liquid crystalline compns. comprise pyridinium compds. II or imidazolium compds. III (R341, R351, R361, and R371 are H or substituents; R311 and R331 are alkyl or alkenyl; Y311 is 4- or 7-membered divalent ring; Q311 and Q321 are divalent group; n = 1-3). Claimed liquid crystalline compds. are represented as IV or V (Q111 is a divalent group; R141, R151, R161, R171 are H or substituent; R131 is alkyl or alkenyl; Y111 is divalent 4, 5, 6, 7-membered substituent; Q121 and Q131 are divalent group). Mixts. containing  $\geq 2$  IV and/or V are also claimed. Claimed electrolytes may comprise the above compds. Claimed batteries comprise the above electrolytes. The photovoltaic cells comprise charge-transfer layers containing the electrolytes and semiconductors responding to radiant rays. The semiconductors may be sensitized with dyes. The electrolytes provide good charge transportation and low volatilization and resulting solar cells have high conversion efficiency and durability.

IT 307558-23-2P

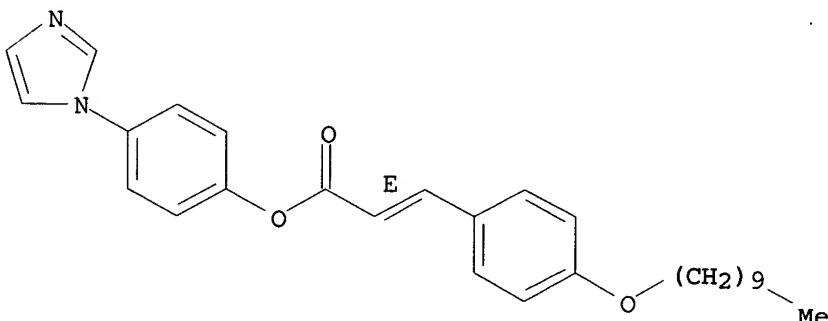
(preparation and reaction of; in preparation of liquid crystalline electrolytes

for solar cells)

RN 307558-23-2 HCPLUS

CN 2-Propenoic acid, 3-[4-(decyloxy)phenyl]-, 4-(1H-imidazol-1-yl)phenyl ester, (2E)- (9CI) (CA INDEX NAME)

Double bond geometry as shown.



IC ICM C07D213-56

ICS C07D213-30; C07D213-68; C07D233-60; C09K019-34; G02F001-13; H01L031-04; H01M010-40; H01M014-00

CC 52-2 (Electrochemical, Radiational, and Thermal Energy Technology)  
Section cross-reference(s): 74

IT 4372-29-6P 77251-82-2P 139475-37-9P 202813-37-4P  
208103-37-1P 307558-21-0P 307558-22-1P 307558-23-2P

(preparation and reaction of; in preparation of liquid crystalline electrolytes  
for solar cells)

L21 ANSWER 13 OF 23 HCPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1996:301109 HCPLUS

DOCUMENT NUMBER: 124:346021

TITLE: Dyes for wool, polyamide fibers and leather,  
having a reactive carboxylic anhydride group

INVENTOR(S) : De Moura, Joao Carlos Vidaurre Pais; De Oliviera-Campos, Ana Maria Ferreira; Maia, Hernani Lopes Da Silva; Hrdina, Radim Gomes, Jaime Isidoro Naylor Rocha, Port.

PATENT ASSIGNEE(S) :

SOURCE: Eur. Pat. Appl., 13 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent

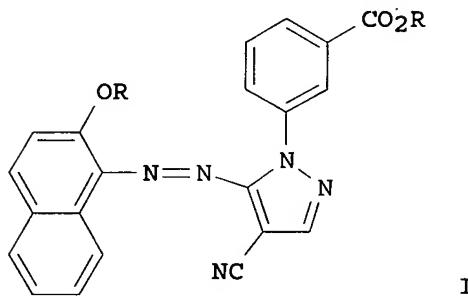
LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 700973	A1	19960313	EP 1995-670003	1995 0413
R: BE, CH, DE, GB, IT, LI, PT				
PRIORITY APPLN. INFO.:			PT 1994-101492	A 1994 0415

OTHER SOURCE(S) : MARPAT 124:346021  
GI



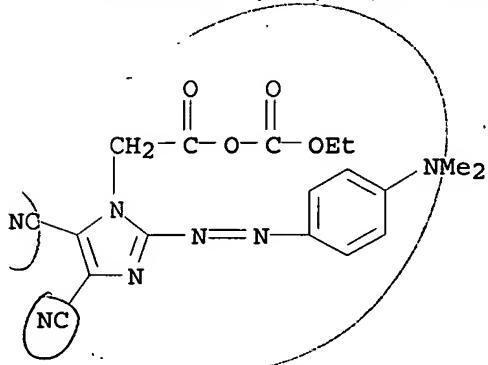
AB The dyes, mainly for wool and polyamide fibers and polyester-wool blends, but also suitable for silk and leather, contain a reactive group of the mixed anhydride type -CO<sub>2</sub>CO<sub>2</sub>R [R = C1-6 (halo)alkyl, (un)substituted Ph, (un)substituted PhCH<sub>2</sub>], which reacts covalently with proteinaceous and polyamide fibers, thus ensuring a high washfastness to alkaline conditions. In their insol. form, the dyes which are devoid of sulfo groups are absorbed by wool only above 70°, showing high migration at this temperature, thus giving more uniform dyeings than when other reactive dyes are used. In their soluble form, dyes containing sulfo groups show a good performance, namely high washfastness on polyamide dyeings. Thus, a DMF solution of I (R = H) was treated with ClCO<sub>2</sub>Et in the presence of Et<sub>3</sub>N to give orange I (R = CO<sub>2</sub>Et).

IT 176542-98-6P  
(red; reactive dyes having a carboxylic anhydride group for wool and polyamide fibers and leather)

RN 176542-98-6 HCPLUS

CN 1H-Imidazole-1-acetic acid, 4,5-dicyano-2-[{4-

(dimethylamino)phenylazo]-, anhydride with ethyl hydrogen carbonate (9CI) (CA INDEX NAME)



IC ICM C09B062-78  
 CC 41-3 (Dyes, Organic Pigments, Fluorescent Brighteners, and Photographic Sensitizers)  
 IT 176542-93-1P 176542-98-6P

(red; reactive dyes having a carboxylic anhydride group for wool and polyamide fibers and leather)

L21 ANSWER 14 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1993:125868 HCAPLUS

DOCUMENT NUMBER: 118:125868

TITLE: Photopolymerizable 2-alkyl-1-(2-methacryloyloxyethyl)imidazoles as crosslinking catalysts for epoxy resins

INVENTOR(S): Yoshioka, Takashi; Murai, Takayuki

PATENT ASSIGNEE(S): Shikoku Chemicals Corp., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 3 pp.

CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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JP 04308578	A2	19921030	JP 1991-102083	1991

PRIORITY APPLN. INFO.: JP 1991-102083

0405

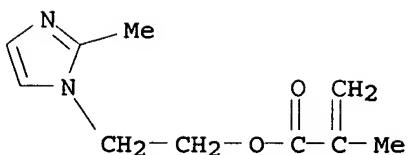
1991  
0405

AB The title imidazoles are useful for curing epoxy resins, giving photocurable products for use as resists. Reacting methacryloyl chloride with 1-(2-hydroxyethyl)-2-undecylimidazole in THF containing Et<sub>3</sub>N and phenothiazine gave 1-(2-methacryloyloxyethyl)-2-undecylimidazole.

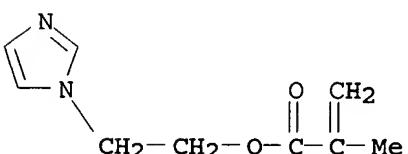
IT 34375-24-1P 62037-81-4P 146490-90-6P  
 (preparation of, as epoxy resin hardener and photoresist)

RN 34375-24-1 HCAPLUS

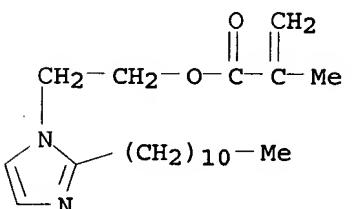
CN 2-Propenoic acid, 2-methyl-, 2-(2-methyl-1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



RN 62037-81-4 HCPLUS  
 CN 2-Propenoic acid, 2-methyl-, 2-(1H-imidazol-1-yl)ethyl ester (9CI)  
 (CA INDEX NAME)



RN 146490-90-6 HCPLUS  
 CN 2-Propenoic acid, 2-methyl-, 2-(2-undecyl-1H-imidazol-1-yl)ethyl ester (9CI) (CA INDEX NAME)



IC ICM C07D233-60  
 ICS C08G059-40  
 CC 37-6 (Plastics Manufacture and Processing)  
 Section cross-reference(s): 35, 74  
 ST methacryloyloxyethylimidazole curing epoxy photoresist;  
 resist photo methacryloyloxyethylimidazole epoxy;  
 imidazole methacryloyloxyethyl curing epoxy photoresist;  
 crosslinking methacryloyloxyethylimidazole epoxy  
 photoresist; photocuring methacryloyloxyethylimidazole  
 epoxy resin  
 IT Crosslinking  
 ((methacryloyloxyethyl)imidazole-cured epoxy resins for, as  
 photoresists)  
 IT Crosslinking agents  
 Crosslinking catalysts  
 ((methacryloyloxyethyl)imidazoles, for epoxy resins, for  
 photoresists)  
 IT Epoxy resins, miscellaneous  
 (curing agents for, (methacryloyloxyethyl)imidazoles as, for  
 photoresists)  
 IT Resists  
 (photo-, (methacryloyloxyethyl)imidazole-cured epoxy resins  
 for)

IT 34375-24-1P 62037-81-4P 146490-90-6P  
 (preparation of, as epoxy resin hardener and photoresist)

L21 ANSWER 15 OF 23 HCPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 1990:523910 HCPLUS  
 DOCUMENT NUMBER: 113:123910  
 TITLE: Electrophotographic preparation of  
 lithographic plate using organic  
 photoconductor  
 INVENTOR(S): Kato, Eiichi; Ishii, Kazuo  
 PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 25 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 02039058	A2	19900208	JP 1988-186917	1988 0728
JP 2640127	B2	19970813	JP 1988-186917	1988 0728
PRIORITY APPLN. INFO.:				

AB In the title photoconductor having on an elec. conductive support a photoconductive layer containing at least a photoconductive compound and a binder resin for use to prepare a lithog. plate by imagewise exposure, development to form toner images, and removing the nonimage area of the photoconductive layer, the binder resin of the photoconductive layer contains a copolymer having  $\geq 1$  monomer component containing  $\geq 1$  functional group which forms  $\geq 1$  CO<sub>2</sub>H group by decomposition

IT 129022-45-3  
 (electrophotog. photoconductors containing, for lithog. plate preparation)

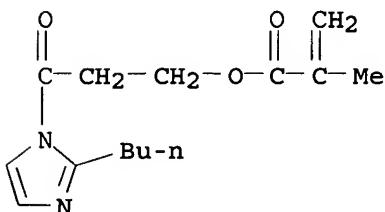
RN 129022-45-3 HCPLUS

CN 2-Propenoic acid, 2-methyl-, butyl ester, polymer with  
 3-(2-butyl-1H-imidazol-1-yl)-3-oxopropyl 2-methyl-2-propenoate and  
 2-carboxyethyl 2-propenoate (9CI) (CA INDEX NAME)

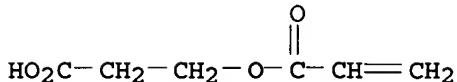
CM 1

CRN 129022-44-2

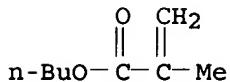
CMF C14 H20 N2 O3



CM 2

CRN 24615-84-7  
CMF C6 H8 O4

CM 3

CRN 97-88-1  
CMF C8 H14 O2

IC ICM G03G013-28  
 ICS B41N001-14; G03G005-05  
 CC 74-6 (Radiation Chemistry, Photochemistry, and  
 Photographic and Other Reprographic Processes)  
 IT 1679-98-7 82532-74-9 82532-76-1 100235-24-3 129022-28-2  
 129022-29-3 129022-30-6 129022-31-7 129022-32-8  
 129022-34-0 129022-36-2 129022-37-3 129022-38-4  
 129022-39-5 129022-41-9 129022-42-0 129022-43-1  
**129022-45-3** 129022-46-4 129045-59-6  
 (electrophotog. photoconductors containing, for lithog. plate  
 preparation)

L21 ANSWER 16 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 1990:506468 HCAPLUS  
 DOCUMENT NUMBER: 113:106468  
 TITLE: Electrophotographic material for lithographic  
 plate preparation  
 INVENTOR(S): Kato, Eiichi; Ishii, Kazuo  
 PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 21 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	-----	-----	-----	-----
-----	-----	-----	-----	-----
JP 01284861	A2	19891116	JP 1988-113458	1988 0512
PRIORITY APPLN. INFO.:			JP 1988-113458	1988 0512

AB In the title material made by forming on an elec. conductive support  $\geq 1$  photoconductive layer and a surface layer, the surface layer comprises mainly a polymer containing a copolymer component containing  $\geq 1$  functional group which produces  $\geq 1$  CO<sub>2</sub>H upon decomposition and a crosslinking agent.

IT 128887-96-7  
(electrophotog. material with surface layer containing, for lithog. plate preparation)

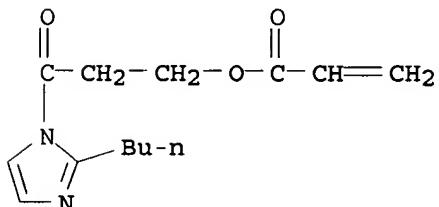
RN 128887-96-7 HCPLUS

CN 2-Propenoic acid, 2-methyl-, 6-hydroxyhexyl ester, polymer with 3-(2-butyl-1H-imidazol-1-yl)-3-oxopropyl 2-propenoate, 1,6-diisocyanatohexane and propyl 2-methyl-2-propenoate (9CI) (CA INDEX NAME)

CM 1

CRN 124246-87-3

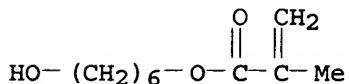
CMF C13 H18 N2 O3



CM 2

CRN 13092-57-4

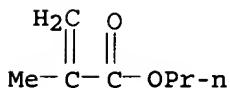
CMF C10 H18 O3



CM 3

CRN 2210-28-8

CMF C7 H12 O2



CM 4

CRN 822-06-0

CMF C8 H12 N2 O2

OCN—(CH<sub>2</sub>)<sub>6</sub>—NCO

IC ICM G03G005-14  
 ICS B41N001-14; G03G013-28  
 CC 74-6 (Radiation Chemistry, Photochemistry, and  
 Photographic and Other Reprographic Processes)  
 IT 128887-91-2 128887-92-3 128887-93-4 128887-94-5  
 128887-95-6 128887-96-7 128887-97-8 128887-98-9  
 128887-99-0 128888-00-6 128888-01-7 128888-02-8  
 128888-03-9 128888-04-0 128977-37-7 128997-13-7  
 128997-14-8 128997-15-9 128997-16-0 128997-17-1  
 129027-50-5 129027-51-6 129027-52-7 129027-53-8  
 (electrophotog. material with surface layer containing, for lithog.  
 plate preparation)

L21 ANSWER 17 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1990:432026 HCAPLUS  
 DOCUMENT NUMBER: 113:32026  
 TITLE: Blanks for electrophotographic lithographic  
 plates  
 INVENTOR(S): Kato, Eiichi; Ishii, Kazuo  
 PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 23 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	----	-----	-----	
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JP 01283572	A2	19891115	JP 1988-112607	
				1988
				0511
PRIORITY APPLN. INFO.:			JP 1988-112607	
				1988
				0511

AB The title blanks comprise an elec. conductive substrate, ≥1 photoconductor layer, and a surface layer, which contains ≥1 partially crosslinked resin containing ≥1 functional group capable of forming ≥1 COOH by decomposition

IT 124238-86-4  
 (surface layer from, for electrophotog. lithog. plate)

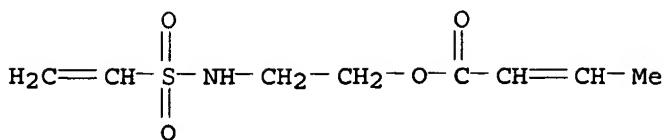
RN 124238-86-4 HCAPLUS

CN 2-Butenoic acid, 2-[(ethenylsulfonyl)amino]ethyl ester, polymer ethyl 2-methyl-2-propenoate and 7-(1H-imidazol-1-yl)-7-oxoheptyl 2-methyl-2-propenoate (9CI) (CA INDEX NAME)

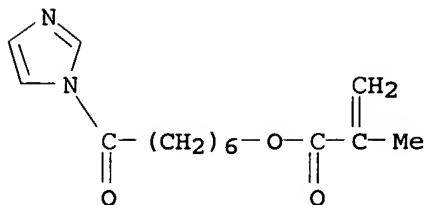
CM 1

CRN 124238-85-3

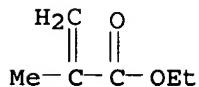
CMF C8 H13 N 04 S



CM 2

CRN 124238-84-2  
CMF C14 H20 N2 O3

CM 3

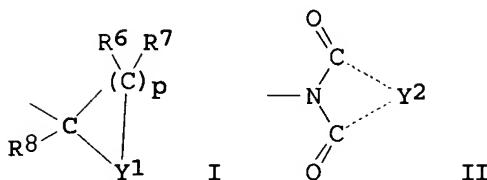
CRN 97-63-2  
CMF C6 H10 O2

IC ICM G03G005-14  
 ICS B41N001-14; G03G013-28  
 CC 74-6 (Radiation Chemistry, Photochemistry, and  
 Photographic and Other Reprographic Processes)  
 IT 119359-85-2 124221-59-6 124221-66-5 124238-71-7  
 124238-75-1 124238-77-3 124238-78-4 124238-80-8  
 124238-83-1 124238-86-4 124261-86-5 124261-87-6  
 124261-88-7 127769-71-5 127769-72-6 127769-73-7  
 127769-75-9 127769-76-0 127769-77-1 127769-78-2  
 (surface layer from, for electrophotog. lithog. plate)

L21 ANSWER 18 OF 23 HCPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 1990:66789 HCPLUS  
 DOCUMENT NUMBER: 112:66789  
 TITLE: Electrophotographic material for lithographic  
 plate preparation  
 INVENTOR(S): Kato, Eiichi; Ishii, Kazuo  
 PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan  
 SOURCE: Eur. Pat. Appl., 42 pp.  
 CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 326169	A2	19890802	EP 1989-101477	1989 0127
EP 326169	A3	19910703		
EP 326169	B1	19940420		
R: DE, GB JP 01191860	A2	19890801	JP 1988-15847	1988 0128
JP 08020778	B4	19960304		
JP 01197765	A2	19890809	JP 1988-21354	1988 0202
JP 08020779	B4	19960304		
US 4960661	A	19901002	US 1989-303220	1989 0130
PRIORITY APPLN. INFO.:			JP 1988-15847	A
				1988 0128
			JP 1988-21354	A
				1988 0202

GI



AB An electrophotog. material for the preparation of a lithog. plate comprises a conductive support having provided thereon  $\geq 1$  photoconductive layer containing photoconductive ZnO and a resin binder which comprises  $\geq 1$  resin containing  $\geq 1$  functional group capable of forming  $\geq 1$  carboxyl group upon decomposition and a heat-curable resin and/or a photocurable resin and a crosslinking agent. The carboxyl-forming functional group contained in the resin is represented by the formula CO<sub>2</sub>L where L = (CR<sub>1</sub>R<sub>2</sub>)<sub>m</sub>(X)<sub>n</sub>Z, MR<sub>3</sub>R<sub>4</sub>R<sub>5</sub>, N = CHQ<sub>1</sub>, COQ<sub>2</sub>, NHOH, I, or II (R<sub>1</sub>, R<sub>2</sub> = H or an aliphatic hydrocarbon group; X = an aromatic hydrocarbon group; Z = H, halogen, trihalomethyl, alkyl, CN, NO<sub>2</sub>, SO<sub>2</sub>R<sub>9</sub> where R<sub>9</sub> = a hydrocarbon group, CO<sub>2</sub>R<sub>10</sub> where R<sub>10</sub> = a hydrocarbon group, or OR<sub>11</sub> where R<sub>11</sub> = a hydrocarbon group; m, n = 0, 1, or 2; R<sub>3</sub>, R<sub>4</sub>, R<sub>5</sub> = a hydrocarbon group or OR<sub>12</sub> where R<sub>12</sub> = a hydrocarbon group; M = Si, Sn, or Ti; Q<sub>1</sub>, Q<sub>2</sub> = a hydrocarbon group; Y<sub>1</sub> = O or S; R<sub>6</sub>, R<sub>7</sub>, R<sub>8</sub> = H or an aliphatic hydrocarbon group; p = 3 or 4; Y<sub>2</sub> = an organic residual group forming a cyclic imido group). The electrophotog. material is not influenced by a variation of environmental conditions of

electrophotog. processing, exhibits excellent preservability before processing, and produces a lithog. plate exhibiting satisfactory hydrophilic properties on the nonimage areas and excellent printing durability.

IT 124246-88-4

(zinc oxide electrophotog. material containing photocurable or heat-curable resin and, for lithog. plate preparation)

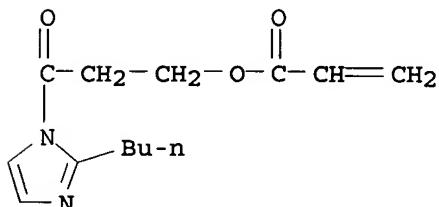
RN 124246-88-4 HCPLUS

CN 2-Propenoic acid, 2-methyl-, butyl ester, polymer with 3-(2-butyl-1H-imidazol-1-yl)-3-oxopropyl 2-propenoate and 6-hydroxyhexyl 2-methyl-2-propenoate (9CI) (CA INDEX NAME)

CM 1

CRN 124246-87-3

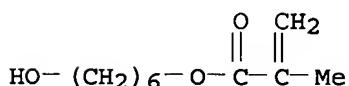
CMF C13 H18 N2 O3



CM 2

CRN 13092-57-4

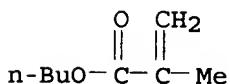
CMF C10 H18 O3



CM 3

CRN 97-88-1

CMF C8 H14 O2

IC ICM G03G013-28  
ICS G03G005-05

CC 74-6 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)

IT 124246-74-8 124246-75-9 124246-76-0 124246-78-2  
124246-79-3 124246-80-6 124246-82-8 124246-84-0  
124246-86-2 124246-88-4 124246-90-8 124246-92-0  
124246-93-1 124246-96-4 124274-35-7 124274-37-9

124296-08-8 124296-11-3 124296-12-4 124296-14-6  
 124296-16-8 124296-17-9 124296-18-0 124296-20-4  
 124296-21-5 124296-23-7 124296-25-9 124296-26-0  
 124296-28-2 124296-29-3 124296-30-6 124296-32-8  
 124296-34-0

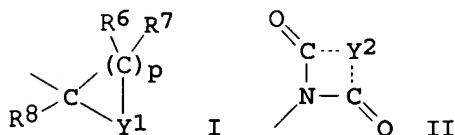
(zinc oxide electrophotog. material containing photocurable or heat-curable resin and, for lithog. plate preparation)

L21 ANSWER 19 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1990:14314 HCAPLUS  
 DOCUMENT NUMBER: 112:14314  
 TITLE: Electrophotographic material for lithographic plate preparation  
 INVENTOR(S): Kato, Eiichi; Ishii, Kazuo  
 PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan  
 SOURCE: Eur. Pat. Appl., 35 pp.  
 CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	-----	-----	-----	-----
EP 326132	A2	19890802	EP 1989-101348	1989 0126
EP 326132 R: DE, GB	A3	19910703		
JP 01191157	A2	19890801	JP 1988-14576	1988 0127
JP 2640109	B2	19970813		
US 5017448	A	19910521	US 1989-302300	1989 0127
PRIORITY APPLN. INFO.:			JP 1988-14576	A
				1988 0127

GI



AB The title material comprises a conductive support having provided thereon  $\geq 1$  photoconductive layer containing ZnO and a resin binder which comprises  $\geq 1$  resin which contains  $\geq 1$  functional group capable of producing  $\geq 1$  CO<sub>2</sub>H group through decomposition and is crosslinked at least in part. The functional group of the resin has the formula CO<sub>2</sub>L where L = (CR<sub>1</sub>R<sub>2</sub>)<sub>m</sub>(X)<sub>n</sub>Z,

MR3R4R5, N = CHQ1, COQ2, NHOH, I, or II (R1, R2 = H or an aliphatic group; X = an aromatic group; Z = H, halogen, trihalomethyl, alkyl, CN, NO<sub>2</sub>, SO<sub>2</sub>R<sub>9</sub> where R<sub>9</sub> = a hydrocarbon group, CO<sub>2</sub>R<sub>10</sub> where R<sub>10</sub> = a hydrocarbon group, or OR<sub>11</sub> where R<sub>11</sub> = a hydrocarbon group; m, n = 0, 1, 2; R<sub>3</sub>, R<sub>4</sub>, R<sub>5</sub> = a hydrocarbon group or OR<sub>12</sub> where R<sub>12</sub> = a hydrocarbon group; M = Si, Sn, or Ti; Q<sub>1</sub>, Q<sub>2</sub> = a hydrocarbon group; Y<sub>1</sub> = O or Si R<sub>6</sub>, R<sub>7</sub>, R<sub>8</sub> = H, a hydrocarbon group, or OR<sub>13</sub> where R<sub>13</sub> = a hydrocarbon group; p = 3 or 4; Y<sub>2</sub> = an organic residue to complete a cyclic imido group; the above-described hydrocarbon group means an aliphatic group including a chain, cyclic alkyl, alkenyl, or aralkyl or an aromatic group including Ph or naphthyl). The electrophotog. material reproduces images faithful to the original and provides a lithog. plate which does not generate background stains owing to strong affinity of the nonimage areas for water.

IT 124238-86-4  
(electrophotog. material containing zinc oxide and, for lithog.  
plate preparation)

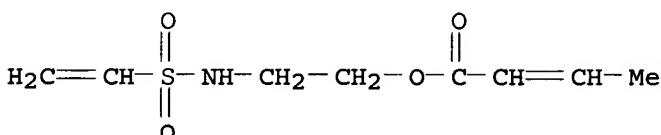
RN 124238-86-4 HCPLUS

CN 2-Butenoic acid, 2-[(ethenylsulfonyl)aminoethyl ester, polymer  
ethyl 2-methyl-2-propenoate and 7-(1H-imidazol-1-yl)-7-oxoheptyl  
2-methyl-2-propenoate (9CI) (CA INDEX NAME)

CM 1

CRN 124238-85-3

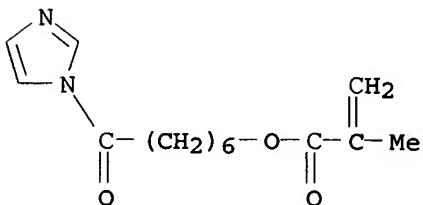
CMF C8 H13 N O4 S



CM 2

CRN 124238-84-2

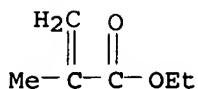
CMF C14 H20 N2 O3



CM 3

CRN 97-63-2

CMF C6 H10 O2



IC ICM G03G013-28

ICS G03G005-05

CC 74-6 (Radiation Chemistry, Photochemistry, and  
Photographic and Other Reprographic Processes)

IT 25719-55-5 124191-37-3 124221-59-6 124221-60-9 124221-61-0

124221-63-2 124221-65-4 124221-66-5 124221-68-7

124238-71-7 124238-73-9 124238-75-1 124238-77-3

124238-78-4 124238-80-8 124238-83-1 124238-86-4

124261-86-5 124261-87-6 124261-88-7

(electrophotog. material containing zinc oxide and, for lithog.  
plate preparation)

L21 ANSWER 20 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1989:125340 HCAPLUS

DOCUMENT NUMBER: 110:125340

TITLE: Electrophotographic lithographic printing  
plate precursor

INVENTOR(S): Kato, Eiichi; Ishii, Kazuo

PATENT ASSIGNEE(S): Fuji Photo Film Co., Ltd., Japan

SOURCE: Eur. Pat. Appl., 35 pp.

CODEN: EPXXDW

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 2

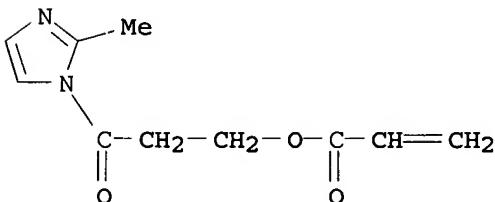
## PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 284748	A2	19881005	EP 1988-102036	1988 0211
EP 284748	A3	19900124		
EP 284748	B1	19931222		
R: DE, GB				
JP 63197964	A2	19880816	JP 1987-28345	1987 0212
JP 01070769	A2	19890316	JP 1987-226694	1987 0911
PRIORITY APPLN. INFO.:			JP 1987-28345	A
				1987 0212
			JP 1987-226694	A
				1987 0911

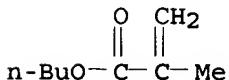
AB An electrophotog. lithog. printing plate precursor giving a printing plate having excellent printing durability comprises a conductive support with ≥1 photoconductive layer and an outermost surface layer containing ≥1 resin having ≥1 functional group capable of forming a carboxyl group upon decomposition

The surface layer can be rendered highly hydrophilic while exhibiting water resistance when subjected to oil-desensitization processing after toner image formation. Thus, a composite electrophotog. plate with a charge-generating layer containing a bisazo pigment and a charge-transporting layer containing a hydrazone was overcoated with a Et methacrylate-tert-butyldimethylsilyl methacrylate copolymer in PhMe, dried, exposed, and processed in an ELP-T automatic platemaking machine to give a plate capable of producing 10,000 prints with clear images and no fog in the nonimage areas.

IT 119359-98-7  
 (electrophotog. lithog. plate precursor with surface layer containing)  
 RN 119359-98-7 HCPLUS  
 CN 2-Propenoic acid, 2-methyl-, butyl ester, polymer with 3-(2-methyl-1H-imidazol-1-yl)-3-oxopropyl 2-propenoate (9CI) (CA INDEX NAME)  
 CM 1  
 CRN 119359-97-6  
 CMF C10 H12 N2 O3



CM 2  
 CRN 97-88-1  
 CMF C8 H14 O2



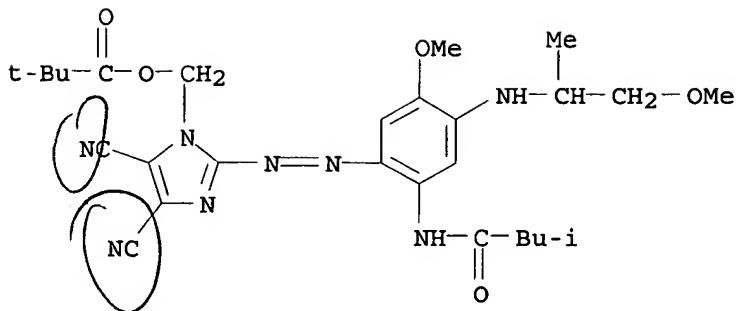
IC ICM G03G013-28  
 CC 74-3 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)  
 IT 113880-92-5 119212-13-4 119212-15-6 119212-16-7  
 119212-18-9 119212-20-3 119359-80-7 119359-82-9  
 119359-84-1 119359-85-2 119359-87-4 119359-89-6  
 119359-96-5 119359-98-7 119360-00-8 119380-12-0  
 119380-14-2  
 (electrophotog. lithog. plate precursor with surface layer containing)

L21 ANSWER 21 OF 23 HCPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 1986:216421 HCPLUS  
 DOCUMENT NUMBER: 104:216421  
 TITLE: Photographic recording material for

INVENTOR(S) : silver-dye-bleach process  
 Tschopp, Paul  
 PATENT ASSIGNEE(S) : Ciba-Geigy A.-G. , Switz.  
 SOURCE: Eur. Pat. Appl., 40 pp.  
 CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: German  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 169813	A2	19860129	EP 1985-810334	1985 0722
EP 169813	A3	19890111		
EP 169813	B1	19920415		
R: BE, CH, DE, FR, GB, IT, LI, NL				
US 4661437	A	19870428	US 1985-757550	1985 0719
JP 61143753	A2	19860701	JP 1985-165033	1985 0727
US 4743683	A	19880510	US 1986-938986	1986 1203
PRIORITY APPLN. INFO.:			CH 1984-3659	A 1984 0727
			US 1985-757550	A3 1985 0719

GI For diagram(s), see printed CA Issue.  
 AB Ag-dye-bleach materials having good color reproduction and giving brilliant colors having outstanding lightfastness contain  $\geq 1$  oil-soluble azo dye (I; R = H, alkyl, alkoxy, Ph, alkylthio, CN, NO<sub>2</sub>, or halogen; R<sub>1</sub> = H, alkyl, OH, or acylamino; R<sub>2</sub> = H or alkoxy; R<sub>3</sub> = H or an optionally substituted NH<sub>2</sub>; A = a 5-membered ring containing  $\geq N$ ; n = 0-3). Thus, an opaque triacetate support was coated with a gelatin-Ag(Br,I) emulsion, prepared by mixing 2.5 mL of a dispersion of II 13.2 mg, a 9:1 EtOAc-tricresyl phosphate mixture 2, 6% aqueous gelatin 6.6, distilled water 0.9, and 8% aqueous Na dibutylphthalenesulfonate 0.5 mL with water 5, gelatin-Ag(Br,I) emulsion 1.5, 4% aqueous gelatin 1, and a 1% hardener solution 1 mL, dried, step wedge-exposed, and processed to give a brilliant, lightfast, purple wedge which showed a d. decrease of 0% after a light exposure of 21 kJ/cm<sup>2</sup>.  
 IT 102300-28-7P  
     (preparation and silver-dye-bleach color photog. applications of)  
 RN 102300-28-7 HCPLUS  
 CN Propanoic acid, 2,2-dimethyl-, [4,5-dicyano-2-[(5-methoxy-4-[(2-methoxy-1-methylethyl)amino]-2-[(3-methyl-1-oxobutyl)amino]phenyl]azo]-1H-imidazol-1-yl]methyl ester (9CI)  
     (CA INDEX NAME)



IC ICM G03C005-52  
ICS C09B029-036

ICA C09B029-039

CC 74-2 (Radiation Chemistry, Photochemistry, and Photographic and Other Reprographic Processes)

Section cross-reference(s): 41

IT 58104-38-4P 94960-34-6P 102300-27-6P 102300-28-7P  
102300-29-8P 102300-30-1P 102300-31-2P 102300-32-3P  
102300-33-4P 102300-34-5P 102300-35-6P 102300-36-7P  
102300-37-8P 102300-38-9P 102300-39-0P 102300-40-3P  
102300-41-4P 102300-42-5P 102300-43-6P 102300-44-7P  
102300-45-8P 102300-46-9P 102300-47-0P 102300-48-1P  
102300-49-2P 102300-50-5P 102300-51-6P 102300-52-7P  
102300-53-8P 102300-54-9P 102300-55-0P 102300-56-1P  
102300-57-2P 102300-58-3P 102300-59-4P 102300-60-7P  
102300-61-8P 102300-62-9P 102300-63-0P 102300-64-1P  
102300-65-2P 102300-66-3P 102300-67-4P 102300-68-5P  
102300-69-6P 102300-70-9P 102300-71-0P 102300-72-1P  
102300-73-2P 102300-74-3P 102325-59-7P

(preparation and silver-dye-bleach color photog. applications of)

L21 ANSWER 22 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1984:532449 HCAPLUS

DOCUMENT NUMBER: 101:132449

TITLE: Imidazolyl substituted addition polymers

AUTHOR(S): Wagner, H. M.; Leyshon, L. J.; Pich, J., Mrs.

CORPORATE SOURCE: Kodak Ltd., UK

SOURCE: Research Disclosure (1984), 243, 327-30 (No. 24315)

CODEN: RSDSBB; ISSN: 0374-4353

DOCUMENT TYPE: Journal; Patent

LANGUAGE: English

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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RD 243015 19840710

PRIORITY APPLN. INFO.: RD 1984-243015

19840710

AB Polymers useful as mordants for photog. anionic image dyes comprise addnl. copolymers having an imidazoyl group attached directly or indirectly to the polymer backbone by one of its ring N and a proportion of the other ring N preferably being quaternized. Thus, a mixture of N-(methacryloyloxyethyl)imidazole 40, Me methacrylate 20, and AIBN 0.32 g in 300 mL EtOH was heated at 75° for 20 h to give a copolymer having log viscosity

(1% in 3:1 EtOH-Me<sub>2</sub>CO at 25°) 22 mL/g. A mixture of 9.6 g above-prepared copolymer and 0.60 g PhCH<sub>2</sub>Cl was heated at 80° for 18 h to give 5% quaternized copolymer having log viscosity 43 mL/g.

IT 92213-12-2DP, quaternized 92213-13-3DP,  
quaternized

(preparation of, for photog. dyes)

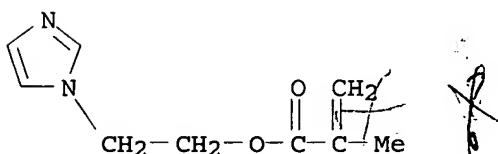
RN 92213-12-2 HCPLUS

CN 2-Propenoic acid, 2-methyl-, 2-(1H-imidazol-1-yl)ethyl ester,  
polymer with methyl 2-methyl-2-propenoate (9CI) (CA INDEX NAME)

CM 1

CRN 62037-81-4

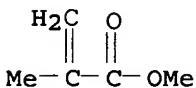
CMF C9 H12 N2 O2



CM 2

CRN 80-62-6

CMF C5 H8 O2



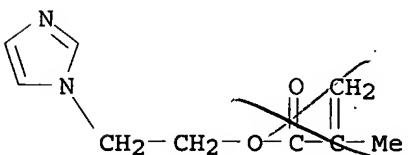
RN 92213-13-3 HCPLUS

CN 2-Propenoic acid, 2-methyl-, 2-(1H-imidazol-1-yl)ethyl ester,  
homopolymer (9CI) (CA INDEX NAME)

CM 1

CRN 62037-81-4

CMF C9 H12 N2 O2



CC 41-11 (Dyes, Organic Pigments, Fluorescent Brighteners, and  
Photographic Sensitizers)

IT 61386-49-0DP, quaternized 92213-12-2DP, quaternized

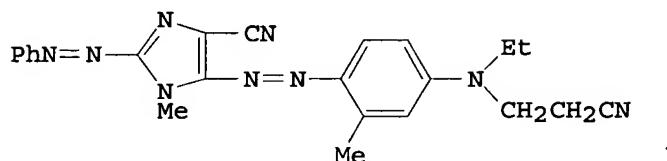
92213-13-3DP, quaternized

(preparation of, for photog. dyes)

L21 ANSWER 23 OF 23 HCAPLUS COPYRIGHT 2006 ACS on STN  
 ACCESSION NUMBER: 1983:199822 HCAPLUS  
 DOCUMENT NUMBER: 98:199822  
 TITLE: Cyanoimidazole disazo disperse dyes  
 PATENT ASSIGNEE(S): Mitsubishi Chemical Industries Co., Ltd.,  
 Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 8 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	-----	-----	-----	-----
JP 57179248	A2	19821104	JP 1981-65057	1981 0428
PRIORITY APPLN. INFO.:			JP 1981-65057	1981 0428

GI



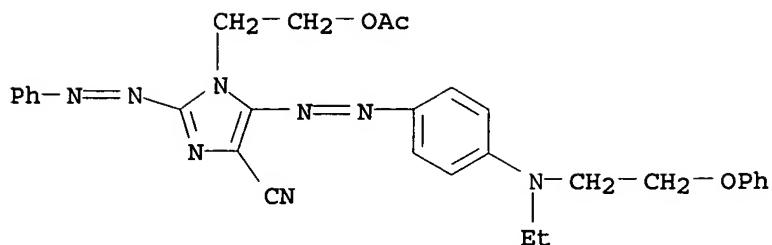
AB Cyanoimidazole disazo dyes were prepared and used for dyeing polyester fibers in fast red to navy blue shades. For example, aniline [62-53-3] was diazotized and coupled with 5-amino-4-cyanoimidazole [5098-11-3] to give 5-amino-4-cyano-2-(phenylazo)imidazole [85449-54-3] which was then diazotized, coupled with N-(2-cyanoethyl)-N-ethyl-m-toluidine [148-69-6], and methylated with di-Me sulfate [77-78-1] to give I [85449-55-4], red on polyester fiber.

IT 85449-02-1

(dye, for polyester fibers, manufacture of)

RN 85449-02-1 HCAPLUS

CN 1H-Imidazole-4-carbonitrile, 1-[2-(acetoxy)ethyl]-5-[[4-[ethyl(2-phenoxyethyl)aminophenyl]azo]-2-(phenylazo)- (9CI) (CA INDEX NAME)



IC C09B031-043; C09B043-11

CC 41-3 (Dyes, Organic Pigments, Fluorescent Brighteners, and  
Photographic Sensitzers)

IT	85448-93-7	85448-94-8	85448-95-9	85448-96-0	85448-97-1
	85448-98-2	85448-99-3	85449-00-9	85449-01-0	
	<b>85449-02-1</b>	85449-03-2	85449-04-3	85449-05-4	
	85449-06-5	85449-07-6	85449-08-7	85449-09-8	85449-10-1
	85449-11-2	85449-12-3	85449-13-4	85449-14-5	85449-15-6
	85449-16-7	85449-17-8	85449-18-9	85449-19-0	85449-20-3
	85449-21-4	85449-22-5	85449-23-6	85449-24-7	85449-25-8
	85449-26-9	85449-27-0	85449-28-1	85449-29-2	85449-30-5
	85449-31-6	85449-32-7	85449-33-8	85449-34-9	85449-35-0
	85449-36-1	85449-37-2	85449-38-3	85449-39-4	85449-40-7
	85449-41-8	85449-42-9	85449-43-0	85449-44-1	85449-45-2
	85449-46-3	85449-47-4	85449-48-5	85449-49-6	85449-50-9
	85449-51-0	85449-52-1	85449-53-2	85449-55-4	85458-39-5

(dye, for polyester fibers, manufacture of)